```
Description
Set
        Items
                COSMETIC? OR MAKEUP OR MAKE() UP OR ROUGE OR LIPSTICK? OR L-
S1
       103082
             IP()STICK? OR LIPBALM? OR LIP()BALM?
                RECEPTACL? OR CONTAINER? OR TUBE? ? OR HOUSING? OR ASSEMBL?
S2
       853485
                DEVIC? OR APPARATUS? OR CASE? ? OR CASING? OR HOLDER?
S3
      1555669
       704079
                UPPER? OR TOP OR TOPMOST? OR TOPWARD?
S4
                LOWER? OR BOTTOM? OR BOTTOMMOST? OR BOTTOMWARD? OR NETHER?
S5
       953364
                ANNULAR? OR ANNULAT? OR CIRCUMFEREN? OR PERIPHER? OR CIRCI-
S6
       566632
             NAT? OR CIRCULAR? OR PERIMETER?
                RING? OR MARGIN? OR FRING? OR BOUNDAR? OR EDGE? OR RIM OR -
S7
       776852
             RIMS OR RIMMED
                 EXTERNAL? OR EXTERIOR? OR OUTWARD? OR OUTER? OR OUTSIDE? OR
S8
       849751
              EXTRANEOUS? OR EXTRINSIC?
                RIB OR RIBS OR KNURL? OR RIDGE? OR PROTRUBER? OR PROJECTIO-
S9
       239213
             N? OR PROTRUSION?
                 SWELL? OR FLUTE? OR HUMP? OR BUMP? OR BULGE? OR JUTTING? OR
S10
       125367
              PAWL? OR DETENT?
S11
       700195
                WALL? OR BARRIER? OR SEPARATOR? OR SEPARATER? OR DIVIDER? -
             OR SEPTUM? OR DIVISION? OR PARTITION?
                 RESILIEN? OR ELASTIC? OR TRACTIL? OR DEFORM? OR FLEXIBL? OR
S12
              FLEXUR? OR FLEXIL? OR DUCTIL? OR TENSIL? OR PLIANT? OR PLIAB-
             L? OR MALLEABL?
                AIRTIGHT? OR AIR()TIGHT? OR HERMETIC? OR IMPERMEABL? OR LE-
S13
             AKPROOF? OR LEAK() PROOF?
                 WAVY OR WAVELIKE? OR WAVE()LIKE? OR SINUSOID? OR CURV? OR -
       363485
S14
             RIPPL? OR UNDULAT? OR PERISTALT? OR CRINKL? OR WAVEFORM? OR W-
                 ENDLESS? OR END()LESS? OR PERPETUAL? OR CONTINUOUS? OR INT-
S15
              ERMINABL? OR INFINIT? OR NEVEREND? OR NEVER() ENDING OR UNINTE-
                 CAP OR CAPS OR LID OR LIDS OR TOP OR TOPS OR COVER? OR SCR-
S16
       812941
              EWTOP? OR CLOSURE?
                 STOPPER? OR BRAKE? OR BRAKING? OR BLOCK? OR JAMB? OR CHOCK?
S17
       670011
               OR CHECK? OR IMPEDIMENT? OR HINDRANC? OR DETERREN?
                 (EXCESSIV? OR UNDUE? OR IMMODERAT?) (2N) (INSERT? OR FORCE? -
S18
              OR PUSH?)
S19
        40616
                 IC=(A45D? OR B29C? OR B29F?)
         5157
                 S1(3N)S2:S3
S20
          800
                 S20 AND S19
S21
S22
          5157
                 S20:S21
S23
          1754
                 S22 AND S9:S10
S24
          711
                 S23 AND S4:S8(5N)S9:S10
S25
          376
                 S23 AND S9:S10(5N)S14:S17
S26
           34
                 S23 AND S18
          190
                 S23 AND S11(5N)S12:S13
S27
          909
                 S23 AND S2:S3(5N)S16
S28
S29
          102
                 S23 AND S15(5N)S6:S7
          552
                 S24 AND (S25 OR S27 OR S28 OR S29)
S30
S31
          164
                 S30 AND S19
                 S24 AND S25 AND S27 AND S28 AND S29
S32
            8
           239
                 S24 AND S25 AND S27:S29
S33
S34
           76
                 S33 AND S19
                 S26 OR S29 OR S32 OR S34
S35
           194
            90
                 S35 AND S19
S36
            90
                 IDPAT (sorted in duplicate/non-duplicate order)
S37
? show files
File 348:EUROPEAN PATENTS 1978-2004/Jul W04
          (c) 2004 European Patent Office
File 349:PCT FULLTEXT 1979-2002/UB=20040729,UT=20040722
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37/3,K/5
             (Item 5 from file: 348)
DIALOG(R) File 348: EUROPEAN PATENTS
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01307961
Material dispenser with applicator
Materialspender mit Auftragsvorrichtung
Distributeur de materiaux avec applicateur
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PATENT (CC, No, Kind, Date): EP 1118286 A2 010725 (Basic) = (US) 2001/0032656
APPLICATION (CC, No, Date):
                              EP 2001420012 010118;
PRIORITY (CC, No, Date): US 177726 P 000121; US 190892 P 000321
DESIGNATED STATES: AT; BE; CH; CY; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI;
  LU; MC; NL; PT; SE; TR
EXTENDED DESIGNATED STATES: AL; LT; LV; MK; RO; SI
RELATED DIVISIONAL NUMBER(S) - PN (AN):
  EP 1243200 (EP 2002009269)
INTERNATIONAL PATENT CLASS: A45D-040/26; A45D-033/00
ABSTRACT WORD COUNT: 76
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  Figure number on first page: 10
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FULLTEXT AVAILABILITY:
Available Text Language
                           Update
                                     Word Count
      CLAIMS A (English)
                           200130
                                      1487
                           200130
                                     10184
      SPEC A
                (English)
Total word count - document A
                                     11671
Total word count - document B
Total word count - documents A + B
                                     11671
```

INTERNATIONAL PATENT CLASS: A45D-040/26 ...

... A45D-033/00

- ...SPECIFICATION instances in plastic or metal. A disadvantage of the pencil is that (as in the **case** of stick-form **lipstick**) the tip quickly rounds off and loses its point in use. Moreover, because the "lead...
- ...match the sharpness or precision of a brush.

 Similar problems have been encountered in the case of other cosmetics products that may be applied in the form of a stick or pencil, such as...the common long axis. Advantageously, in these embodiments, the applicator unit includes at least one projection disposed to engage the proximal portion of the inner member for rotating the inner member...
- ...respectively in and out of register with the lateral opening of the housing member. This **projection** is a laterally projecting nib, and the

proximal portion of the inner member may have...

- ...has a proximal inner wall portion, surrounding the well, formed internally with a groove or **ridge** engageable with the nib or nibs for retaining the applicator in the well. In one...e., the end of the container unit remote from the well 16), serves as a **cosmetic** material **receptacle**. This drawer, open laterally along one side as indicated at 20, receives a coherent body...
- ...and drawer are conveniently all substantially rigid molded plastic members, as is conventional for portable **cosmetic containers** and dispensers, although one or more of them may be fabricated wholly or partly of...
- ...air. The drawer has an enlarged outer end 26 serving as a stop to prevent excessive insertion of the drawer within the housing member, and to cooperate with the end 24 and...the recess 50 when the member 48 is rotated to an appropriate angular orientation. A knurled knob 56, connected to member 48 and disposed at the end of the housing member...
- ...consumer does not need to buy a complete dispenser device each time the supply of cosmetic material in the receptacle is exhausted.

 In the further modified embodiment of FIGS. 12-15, the lip colorant dispenser...shown in FIG. 14 so as to be shielded from the air between applications. The receptacle for cosmetic material in this embodiment of the invention is a recess or reservoir 78 formed in...
- ...restrained against axial movement relative to the housing member. The cover member may have a **knurled** distal end 106 to facilitate manual rotation of the cover member relative to the housing...embodiment, this angle is 135(degree).

As seen in FIGS. 26 and 28, cooperating stop **projections** 154 and 156 may be respectively formed on the interior wall of the base cap...

- ...is respectively open and closed, as selected by the user.

 More particularly, the respective stop **projections** 154 and 156 of the base cap and the insert interengage with a sensible click...
- ...click, being thereby assured that the desired locked position has been attained. As shown, the **projection** 154 is an axially oriented **rib**, and the **projections** 156 constitute two pairs of short, parallel, axially oriented **ribs** respectively positioned to snap or click into locking engagement with **projection** 154 at the locations at which the pocket is fully open and fully closed, i...
- ...withdrawal of the applicator result in concomitant and effectively automatic closing and opening of the receptacle holding the cosmetic material. As hereinafter explained, in the described embodiment there are alternative ways of opening and...the stem. That is to say, in addition to the locking engagement between lugs or ribs 156a on the insert and lug or rib 154a on the inner wall of the base cap (described above with reference to the embodiment of FIGS. 20-31), the rib 154a may be extended in the proximal direction to engage, and serve as a stop...of the material. The brush is securely but removably received within a well, and the receptacle /reservoir containing the cosmetic material is securely but openably covered. For application of the material, the user manually removes the brush from the well, manually opens the receptacle /reservoir, picks up cosmetic material therefrom, and applies it to a selected facial region. When the application is complete...
- ...CLAIMS A dispenser as defined in claim 11, wherein the applicator unit

includes at least one **projection** disposed to engage the proximal portion of the inner member for rotating the inner member...

...of the housing member.

- 13. A dispenser as defined in claim 12, wherein said one **projection** is a laterally projecting nib, and wherein said proximal portion of the inner member has...
- ...has a proximal inner wall portion, surrounding the well, formed internally with a groove or **ridge** engageable with the nib for retaining the applicator in the well.
 - 15. A dispenser as...when the applicator unit is at least partially inserted in the proximal end of the **housing** member.
 - 29. A cosmetics package comprising a dispenser as defined in claim 1 and a coherent body of material disposed in the receptacle thereof.
 - 30. A cosmetics package as defined in claim 29, wherein said applicator is a brush and said material...

37/3,K/7 (Item 7 from file: 349)

DIALOG(R) File 349:PCT FULLTEXT

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00797035 **Image available**

HAND-HELD MULTIPURPOSE CASING WITH STRUCTURE FOR REVERSIBLY EXTENDING FUNCTIONAL TIPPED DEVICE

BOITIER MULTI-USAGE TENU A LA MAIN POURVU D'UNE STRUCTURE POUR DISPOSITIF FORMANT UN EMBOUT FONCTIONNEL A EXTENSION REVERSIBLE

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AE AG AL AM AT AU AZ BA BB BG BR BY BZ CA CH CR CU CZ DE DK DM DZ EE ES FI GB GD GE GH GM HR HU ID IL IN IS KE KG KP KR KZ LC LK LR LS LT LU LV MA MD MG MK MN MW MX MZ NO NZ PL PT RO RU SD SE SG SI SK SL TJ TM TR TT TZ UA UG UZ VN YU ZA ZW

(OA) BF BJ CF CG CI CM GA GN GW ML MR NE SN TD TG

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(EA) AM AZ BY KG KZ MD RU TJ TM

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Main International Patent Class: A45D-040/02

Fulltext Availability: Detailed Description Claims

English Abstract

...device holder having a functional tipped device at its front tip and housed within the **casing** . A **cap** is fixedly mounted to the rear end of the rear barrel, with two holding slots...

...diametrically opposite positions. A screw-type actuating unit movably engages with both the functional tipped **device holder** and the **cap** through two spiral screw-type engagements with opposite spiral directions.

Detailed Description

... reversibly extending such a functional tipped device, the casing also having an automatically operated protective cover for the functional tipped device.

Background Art

A variety of makeup brushes, such as loose powder brushes, fan brushes, lip...

...casing by an action of the threaded bar or the threaded rod relative to the casing .

However, the **caps** have to be removed from the casings when it is desired to use the makeup...

...brushes.

It is thus necessary to provide a structurally improved makeup brush, with a protective **cover** being set within the **casing** of the brush so as to save the user from the inconvenience of losing a...

...invention is to provide a hand-held multipurpose casing, which is preferably used as a makeup brush casing and has an automatically operated protective cover firmly set within the casing and used for protecting the functional tipped device, for example, a makeup brush, housed within the casing, thus preventing a careless loss of the protective cover and...

...in its length as desired, thus being more 2 conveniently usable in comparison with conventional makeup brush casings having fixed lengths.

A further object of the present invention is to provide a hand...

- ...opposite positions, and a screw-type actuating unit movably engaging with both the functional tipped **device holder** and the **cap** through two spiral screw-type engagements with opposite spiral directions, the unit primarily converting an...
- hand-held multipurpose casing, having a screw-type actuating unit and used as a **makeup** brush **casing**, in accordance with the primary embodiment of the present invention; Fig. 2 is a perspective...a hand-held multipurpose casing, having a cylinder-type actuating unit and used as a **makeup** brush **casing**, in accordance with the second embodiment of the present invention; Fig. 7 is a sectional...
- ...a hand-held multipurpose casing, having a screw-type actuating unit and used as a makeup brush casing, in accordance with the sixth embodiment of the 20 present invention, particularly showing an automatically operated brush cover set within the casing;
 Fig. 16 is a perspective view showing an operation of the hand-held multipurpose casing...
- ...a hand-held multipurpose casing, having a screw-type actuating unit and used as a makeup brush casing, in accordance with the seventh embodiment of the present invention;
 Fig. 22 is a perspective...
- ...held multipurpose casing, having a screw-type actuating unit and used as a writing instrument casing with an automatically operated cartridge cover set within the casing, in accordance with the ninth embodiment of the present invention; Fig. 32 is an exploded...

...type actuating units at opposite end
25 portions of the casing and used as a makeup brush casing, in
8
accordance with the eleventh embodiment of the present invention;
Fig. 36 is a...

...actuating units set within
5 opposite end portions of the casing and used as a makeup brush
casing, in accordance with the twelfth embodiment of the
present invention; and
Fig. 37 is an...

hand-held multipurpose casing, having a screw-type actuating unit and used as a makeup brush casing, in accordance with the primary embodiment of the present invention. Fig. 2 is a perspective...cap 16 has a central 10 hole closed at its rear end, with two guide projections 55 being formed on the internal surface of the cap 16 at diametrically opposite positions. The two guide projections 55 of the cap 16 movably engage with the external thread Ill formed on the longitudinal actuating part 112...

...to that of the external thread 111 of the rotatable rod 110.

to The guide **projections** 55, formed on the internal surface of the cap 16, movably engage with the external...

...part 112 of the rotatable rod 110. Due to such a movable engagement of the projections 55 with the external thread 111, the rotatable rod 110 is 15 rotated when the rear barrel 15 with...U-shaped cross-section when cutting the cap 16 in an axial direction. In the cap 16, the two guide 15 projections 55 are f ormed on the internal surface at diametrically opposite positions, and movably engage...is moved forward as described above, the thrust rod 31 is moved backward within the casing, and so the makeup brush 33 is fully retracted into the front barrel 13 of the casing, thus being...

...is moved backward on the middle barrel 12 to project the brush 33 from the casing, the cap 16 is moved along with the rear barrel 15 in the same direction since the...

...a hand-held multipurpose casing, having a cylinder-type actuating unit and used as a makeup brush casing, in accordance with the second embodiment 5 of the present invention. Fig. 7 is a...16 is integrated with the rear end of the rear barrel 15. In such a case, the bolt 17 of the cap 16 is tightened to the internally threaded opening 11 of the cap rod 10.

In the multipurpose casing of this embodiment, the makeup brush 33, such as a loose powder brush, a fan...moved forward as described above, the thrust rod 8 is fully moved backward

within the casing. The makeup brush 33 is thus fully retracted into the front barrel 13 of the casing, and is stored within 5 the casing.

That is, when the <code>cap</code> rod 10, integrated with the rear barrel 15, is moved backward within the second chamber...to separate the front and rear barrels 13 and 15 from each other. A guide <code>projection</code> 46 is axially formed on the internal surface of the middle barrel 12, and movably...

- ...groove 47 of the cap rod 10. Due to the movable engagement of the guide **projection** 25 46 of the middle barrel 12 with the guide groove 47 of the cap...
- ...engagement of its internally threaded hole 19" with 10 the external thread 41" of the cap rod 10. The multipurpose casing of this embodiment also has a clip 45, of which the ring 56 is fitted...
- ...in detail herein below.

 In order to assemble the casing, the rotatable rod 9 is

 assembled with the cap rod 10 by making the external spiral
 thread 3211 of the rotatable rod 9 movably...the guidance of the
 guide grooves 114 of the plug 14. In addition, the guide

 projection 46 of the middle barrel 12 movably engages with the
 axial guide groove 47 of...
- ...is moved in the same direction.

In such a case, the rotatable rod 9, movably assembled 15 with the cap rod 10 through a screw-type engagement, is rotated clockwise.

Due to such a clockwise...

such as dust, into the...

...a hand-held multipurpose casing, having a screw-type actuating unit and used as a makeup brush casing, in accordance with the sixth embodiment of the present invention, particularly showing an automatically operated brush cover set within the casing. Fig. 16 is a 34 perspective view showing an operation of the hand-held multipurpose...and 32 35 extending along the brush holder 18 at diametrically opposite positions within the casing. The above brush cover is used for preventing an undesired introduction of foreign substances,

- ...The cap 16
 has a central hole closed at its rear end, with two guide
 projections 55 being formed on the internal surface of the cap
 at diametrically opposite positions. The two guide
 projections 55 of the cap 16 movably engage with the external
 thread 111 formed on the longitudinal actuating part 112...
- ...cover part 36 formed at the front end of the guide part and a bend **projection** 34 formed at the- rear end of the guide part.

When the makeup brush 33...

...cover members 30 and 32 are mounted to the two holding slots 42 of the cap 16 at their bent projections 34, and so the cover members 30 and 32 are prevented from an undesired rotating action within the casing. In...barrel 15 with the cap 16, the rear barrel 15 is movable along with the cap 16.

The guide **projections** 55, formed on the internal surface of the cap 16, movably engage with the external...

- ...thread 111 of the rotatable rod 110. Due to such a movable engagement of the **projections** 55 of the **cap** 16 with the external thread 111 of the rotatable rod 110, the rotatable rod 110...
- ...U-shaped cross-section when cutting the cap 16 in an axial direction. In the cap 16, the two guide projections 55 are formed on the internal surface at diametrically opposite positions, and movably engage with...
- ...casing and preventing an undesired introduction of foreign substances into the casing. In such a case, the closed cover parts 36 of the two cover members 30 and 32 also protect the fully retracted...
- ...is not necessary for the casing of this embodiment to have a conventional separate protective cap, and so the casing of this embodiment saves a user from the inconvenience caused by losing the separate protective...
- ...cover members 30 and 32 are mounted to the two holding slots 42 of the cap 16 at their bent projections 34, and so the cover members 30 and 32 are prevented from an undesired rotating action within the casing.
 - Of course, it should be understood that each of the bent projections 34 may be bent once or more as desired if the projections 34 are firmly held to the holding slots 42 of the cap 16 without being...
- ...external surface of the cap 16 at diametrically opposite positions, thus firmly holding the bent projections 34 of the two cover members 30 and 32. Therefore, the packing plug 120 prevents an undesired rotating action of...is moved forward as described above, the thrust rod 31 is moved backward within the casing, and so the makeup brush 10 33 is fully retracted into the front barrel 13 of the casing, thus...
- ...is moved backward on the middle barrel 12 to project the brush 33 from the casing, the cap 16 is moved along with the rear barrel 15 in the same direction 20 since...a hand-held multipurpose casing, having a screw-type actuating unit and used as a makeup 5 brush casing, in accordance with the seventh embodiment of the present invention. Fig. 22 is a perspective...
- ...is larger than that of the sixth embodiment. In order to

5 allow the two **projections** 55 of the **cap** 16 to precisely engage with the external thread 221 of the rod 110, the interior surface of the cap 16 is stepped to enlarge the inner diameter of the **cap** 16. The two **projections** 55 are formed on the stepped internal surface of the cap 16 at a front...

...cover member 30 or 32 to be 48

elastically deformed during an operation of the casing. Each of the two cover members 30 and 32 has one bent projection 34 at its rear end, and is held on the cap 16 at the bent projection 34. The bent projection 34 is formed by bending the 5 rear end of the longitudinal guide part of...

...semicircular

cover part 37 is longer than that of the part 3 6 and two projections 5 are formed at the rear end of each cover member 30 or 32 different from the embodiment of Fig. 22. Due to the projections 5 of Fig. 23, it is possible to more firmly hold the cover members 30...part of the rotatable rod 79 is axially inserted into the central hole of the cap rod 77. In such a case, the external spiral thread 64 of the rotatable rod 79 movably engages with the internal...

...axial movement of the cap rod 77.

In the embodiment of Fig. 24, a guide **projection** 46 is axially formed on the internal surface of the middle barrel 76 at the...

...groove 47 of the cap rod 77. Due to the movable engagement of the guide **projection** 46 of the middle barrel 76 with the guide groove 47 of the cap rod...

...middle barrel 76.

In the embodiment of Fig. 24, the movable engagement of the guide **projection** 46 of the middle barrel 76 with the guide groove 47 of the cap rod...

...80.

The embodiment of Figs. 24 to 26, having the stop groove 44, the guide **projection** '46 and the guide groove 47, may be 20 preferably used as a hand-held...32 are held on the cap rod 10, 5 and are axially movable within the **casing** along with the **cap** rod 10.

Two packing plugs 21 and 23 are closely fitted into the opposite ends... $\dot{}$

...cover part 36 formed at the front end of the guide part and a bend **projection** 34 formed at the rear end of the guide part. When the makeup brush 33...

...two protective cover members 30 and 32 are held on the holding slots of the 1cap rod 10 at their bent projections 34, and axially extend forward within the casing while passing along the external axial slots...

...front opening of the casing.

When the thrust rod 8 axially moves forward within the casing as described above, the two cover members 30 and 32 move backward along with the cap rod 10. The cover parts...16 is integrated with the rear end of the rear barrel 15. In such a case, the bolt 17 of the cap 16 is tightened to the internally threaded opening 11 of the cap rod 10.

In...

- ...within the first chamber 4 to be moved in a forward direction. In such a case, the two protective cover members 30 and 32 are axially moved backward along with the cap rod 10, and...
- ...the casing, thus elastically closing the front end of the front barrel 13 by the **cover** parts 36. In such a **case**, the thrust rod 8 is fully moved backward within the first chamber 4 of the...
- retracted into the front barrel 13 of the casing, and is stored within the casing. That is, when the cap rod 10, integrated 25 with the rear barrel 15, is moved backward within the second...held multipurpose casing, having a screw-type actuating unit and used as a writing instrument casing with an automatically operated cartridge cover set within the casing, in accordance with the ninth embodiment of the present invention. Fig. 32 is an exploded...
- ...members
 30 and 32 axially extend within the casing at diametrically opposite positions. The bent **projection** 34 of each of the two cover members 30 and 32 is fixedly held in...
- ...11 and 12, but two protective cover members 30 and 32 axially extend within the **casing** .

The two ${\bf cover}$ members 30 and 32 are fixedly held on the 15 cap rod 10, and so...

- ...screw-type actuating units at opposite end portions of the casing and used as a **makeup** brush **casing**, in 20 accordance with the eleventh embodiment of the present invention. Fig. 36 is a...
- ...type actuating units set within opposite end portions of the casing and used as a makeup brush casing, in accordance with the twelfth embodiment of the present invention. Fig. 37 is an exploded...
- ...shape, the external spiral thread has a larger diameter. In order to allow the two **projections** of the 25 **cap** 16 to precisely engage with the external spiral thread of 64 the rod 110, the interior surface of the cap 16 is stepped to enlarge the inner diameter of the **cap** 16, with the two

projections being formed on the stepped internal surface of the
cap 16 at a front portion...

...units, individually having the above-mentioned construction, are symmetrically provided at opposite ends of one cap 16, and so the casing may be provided with two makeup brushes actuated by the two actuating units. of course...connector 27 is fixed to the internal surface of a movable barrel 15 of the casing, thus allowing the two cap rods 10 to be movable along with the barrel 15 in opposite directions.

65 In...

...of the two cover members 30 and 32 comprises a longitudinal guide part, with a **cover** part 36 and a bent **projection** 34 being formed at opposite ends of the longitudinal guide part.

of course, it should...

...casing of this

embodiment may be provided with a stop groove 44, a guide **projection** 46 and a guide groove 47 in the same manner as that described for the...

... This casing also allows a user to purchase it at low cost.

Different from conventional casings for such makeup brushes or writing instruments, it is not necessary for the casing of this invention to have a removable separate cap, but an automatically operated protective cover is set within the casing. The casing of this invention thus saves a user from the inconvenience of losing a...

...inconvenience of being stained with cosmetics of the makeup 67 brush. Due to the protective **cover**, the interior of the **casing** of this invention is effectively protected from foreign substances, such as dust. Since the protective **cover** is set within the **casing** and is automatically operated in response to 5 an axial movement of a rear barrel...

10 recyclable as desired.

The casing of this invention is preferably usable as a casing for makeup brushes or a casing for writing instruments, such as ballpoint pens.

In a detailed description, the casing of this...

...number of parts, and is easily assembled and disassembled when necessary. Due to the protective cover set within the casing, the interior of the casing is less likely to become contaminated with foreign substances, such...

...to smoothly move on

the middle barrel.

Since the rear barrel is integrated with the <code>cap</code>, the <code>casing</code> is adjustable in its length as desired. That is, when the rear barrel along

Claim

... positions; and

a screw-type actuating unit movably engaging with both the 20 functional tipped **device holder** and the **cap** through two spiral screw-type engagements with opposite spiral directions, said unit primarily converting an...

...same

construction, said two cover members individually comprising a longitudinal guide part, with both a **cover** part and a bent **projection** formed at opposite ends of the guide part, said two cover members being held by the holding slots of said **cap** at the bent **projections** and axially extending forward within the casing so as to be movable along with the...

...The hand-held multipurpose casing according to claim 1 or 2, wherein said functional tipped **device** is a **makeup** brush 15 selected from the group consisting of loose powder brushes, fan brushes, lip brushes...

...same

construction, said two cover members individually comprising a longitudinal guide part, with both a **cover** part and a bend **projection** formed at opposite ends of the guide part, said two **cover** members being housed within the **casing** and being movable along with the rear barrel in ...casing according to claim 8 or 9, wherein said middle barrel has an axial guide **projection** on its internal surface at a lower portion, and movably engages with said guide groove of the **cap** rod at the guide **projection**, thus being prevented from being rotated around the cap rod.

- 17 The hand-held multipurpose...
- ...construction, said two cover members individually comprising a longitudinal guide part, with both a semicircular cover part and a bend projection formed at opposite ends of the guide part, said two cover members being held by the holding slots of said cap rod at the bent projections.
 - 25 The hand-held multipurpose casing according to claim 23 or 24, wherein both the cap rod and thrust rod are provided at each end portion of the **casing**, with the two **cap** rods provided at opposite portions of the casing being connected to each other by a connector.
 - . A hand-held multipurpose casing having a removable protective cap, comprising: a cylinder having a partition wall therein, said partition wall dividing the interior of...construction, said two cover members individually

comprising a longitudinal guide part, with both a semicircular
 cover part and a bend projection formed at opposite ends of the
guide part, said two cover members being held by holding slots
of said cap rod at the bent projections .

A hand-held multipurpose casing used for housing a functional tipped device while allowing the tipped device to be reversibly extendible from the casing, wherein said functional tipped device is a makeup brush, selected from the group 5 consisting of loose powder brushes, fan brushes, lip brushes...

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37/3, K/9
             (Item 9 from file: 348)
DIALOG(R) File 348: EUROPEAN PATENTS
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01256917
Case of stick-type cosmetic preparation and replaceable cartridge of
    stick-type cosmetic preparation used therefor
           fur
                 stabformige kosmetische Erzeugnisse und auswechselbare
    Kosmetikpatrone fur diesen Behalter
Recipient pour produit cosmetique en baton et cartouche de produit
    cosmetique remplacable pour ce recipient
PATENT ASSIGNEE:
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LEGAL REPRESENTATIVE:
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PATENT (CC, No, Kind, Date): EP 1084646 A2 010321 (Basic)
                              EP 1084646 A3 030827
APPLICATION (CC, No, Date):
                              EP 2000126070 960627;
PRIORITY (CC, No, Date): JP 95262205 950914; JP 96126358 960422; JP
    96150321 960521
DESIGNATED STATES: DE; ES; FR; GB; IT
RELATED PARENT NUMBER(S) - PN (AN):
  EP 791308 (EP 96921129)
INTERNATIONAL PATENT CLASS: A45D-040/02; A45D-040/16
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FULLTEXT AVAILABILITY:
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      CLAIMS A (English)
                           200112
                                      1996
      SPEC A
                (English)
                           200112
                                     20622
Total word count - document A
                                     22618
Total word count - document B
                                         0
Total word count - documents A + B
                                     22618
INTERNATIONAL PATENT CLASS: A45D-040/02 ...
... A45D-040/16
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...SPECIFICATION 13 is a decomposed perspective view showing a part of the constituents of the lipstick case 110; and Fig. 14 is a perspective view showing the residual constituents of the lipstick case 110. The following describes the structure of the lipstick case 110 based on the drawings of Figs. 11 through 14, the structure and operation for realizing protrusion of the lipstick K from the lipstick case 110, and the structure and operation for realizing attachment and detachment of the predetermined section including the lipstick K.

Referring to Figs. 11 through 14, the **lipstick** case 110 includes a cylindrical main body 120 having a bottomed **tube** 120a, a **cover** 130 attached to the main body 120, a sleeve 140 slidably accommodated in the bottomed...

...form an inclined opening 122. In the description below, the opening end

- 122 of the lipstick case 110 is referred to as the upper side and the bottomed end as the lower...
- ...120a is arranged on the upper end of the inclined opening 122, and an attachment **projection** 135 below the attachment groove 134. An guide cut 136 is formed at the intermediate...
- ...gradually decreased towards the inside of the tube 120a. The attachment groove 134, the attachment **projection** 135, and the guide cut 136 are constituents relating to the attachment and detachment of...
- ...which is constructed by inserting the horizontal shaft 131b into a through hole of a **protrusion** 131a formed at a predetermined position in the vicinity of the circumference of the cover...
- ...supported by the hinge 131 to freely open and close the opening 122 of the tube 120a. The cover 130 is press-opened by means of the upper end of the sleeve 140 to enable the lipstick K to be protruded from the lipstick case 110 as discussed below. The hinge 131 is structured to apply a predetermined resistance at...
- ...the cover 130 to be opened and held at a desirable angle.

 An inclined ring projection 132, which is extended from the bottom face of the cover 130, is fitted in the inclined opening 122 when the cover 130 is in closed position. An engagement pawl 132a is arranged at a predetermined position on the side face of the inclined ring projection 132 of the cover 130. When the cover 130 is in closed position, the engagement pawl 132a is received in an engagement recess 133a, which is formed at a corresponding position inside the opening 122 of the main body 120. Engagement of the engagement pawl 132a with the engagement recess 133a and its release ensure a moderate touch when the
- ...174, the guide groove 178, and the second sliding piece 179 are constituents involved in **protrusion** of the lipstick K from the **lipstick** case 110 and described later in a greater detail.

 The lifting mechanism 160 realizes the **protrusion** of the lipstick K from the **lipstick** case 110. The lifting mechanism 160 includes a operating member 162, a belt 164, the cam...
- ...lifting mechanism 160 as well as the operation of protruding the lipstick K from the lipstick case 110.

 The user operates the operating member 162 with a finger to enable the lipstick K to be protruded from and accommodated into the lipstick case 110. The operating member 162 is fitted in a control slot 120d (see Figs. 13...
- When the lipstick K is thoroughly accommodated in the lipstick case 110, the operating member 162 is ...the position shown in Fig. 11(D)), the lipstick K is gradually protruded from the lipstick case 110. At this moment, a second end of the belt 164 slides along the belt...the user operates the operating member 162 to make the lipstick K protruded from the lipstick case 110. Fig. 17 shows a series of movements of the lifting mechanism 160 in the course of operation for protruding the lipstick K from the lipstick case 110. More concretely, the drawing of Fig. 17 shows the engagement state of the first...
- ...of the second sliding piece 179 with the guide groove 178, and the state of **protrusion** of the sleeve 140 and the lipstick K corresponding to the

respective positions of the...

...on the plane.

In the state of Fig. 11(B), the opening 122 of the **tube** 120a is closed with the **cover** 130, and the lipstick K is thoroughly accommodated in the main body 120. Under such...

- ...distance, the upper end of the lifted sleeve 140 comes into contact with the ring projection 132 of the cover 130. When the user further slides down the operating member 162, the upper end of the sleeve 140 press-opens the cover 130 and goes up beyond the ring projection 132, so that the sleeve 140 is protruded from the opening 122 of the main...
- ...cover 130 to close the opening 122 of the main body 120 and return the lipstick case 110 to the initial state (corresponding to the state of Figs. 11(A) through 11(C)).

The lipstick case 110 having the lifting mechanism 160 discussed above is further provided with the attachment mechanism...

...by a new lipstick K. The following describes the attachment mechanism 180 included in the **lipstick case** 110 of the second embodiment and a concrete procedure of attaching and detaching the lipstick K to and from the **lipstick case** 110.

The mechanism and process of detaching the predetermined section including the lipstick K from the main body 120 are described first. In the lipstick case 110 of the second embodiment, the sleeve 140 and the support member 150 for supporting...

- ...to the shape of the attachment groove 134 before coming into contact with the attachment **projection** 135 (see Figs. 13 and 14). When the sleeve 140 is further pressed in, the second sliding piece 179 goes over the attachment **projection** 135 and reaches the position in the vicinity of the connection hole 175 formed in...
- ...back by the resilience of the second leaf spring 177 when going over the attachment **projection** 135. This enables the second sliding piece 179 to be fitted into the connection hole...
- ...cover 130 to close the opening 122 of the main body 120 and return the lipstick case 110 to the initial state (corresponding to the state of Figs. 11(A) through 11(C)).

In the lipstick case 110 of the second embodiment thus constructed, a simple sliding operation of the operating member...

- ...unit 182 to and from the main body 120 according to the requirements. In the **lipstick case** 110 of the second embodiment, the cartridge unit 182 is linked with the main body...
- ...while the second sliding piece 179 is fitted in the horizontal slot 178a. The attachment **projection** 135 formed on one end of the attachment groove 134 as well as ...179 is kept in the horizontal slot 178a of the guide groove 178.

In the lipstick case 110 of the second embodiment, the cartridge unit 182 is attached to the main body...

...contact with the exterior but is kept under preferable sanitary conditions. The structure of the <code>lipstick</code> case 110 of this embodiment further allows the cartridge unit 182 to be attached without significant ...upward sliding movement of the operating member 162 moves the sleeve 140 down in the <code>tube</code> 120a and enables the <code>cap</code> 185 to be removed from

the sleeve 140 at a predetermined position. In case that...

- ...130 to close the opening 122 of the main body 120 under such conditions, the lipstick case 110 can be returned to its initial state (corresponding to the state of Figs. 11...
- ...may come into contact with the inner wall of the cap 185.

 In the lipstick case 110 of the second embodiment, the cartridge unit 182 has the first sliding piece 174...
- ...connection hole 175 of the belt 164 on the main body 120. This configuration of projection -recess engagement may, however, be reversed according to the requirements. Another lipstick case 110A having a lifting mechanism 160A with the reverse configuration of projection -recess engagement to that of the lipstick case 110 of the second embodiment is described as a third embodiment according to the invention. The lipstick case 110A of the third embodiment has similar structure to that of the lipstick case 110 of the second embodiment except the configuration of projection -recess engagement. The symbol 'A' is added to the numerals representing the constituents of the lipstick 110A, which are identical with or correspond to those of the lipstick case 110. Such constituents may not be specifically described here. The case 110A of the third embodiment has substantially the same appearance as that of the lipstick case 110 shown in Fig. 11. Fig. 20 is a decomposed perspective view illustrating a main body 120A, a sleeve 140A, and a support member 150A of the lipstick case 110A. While the sleeve 140 of the second embodiment has the guide groove 178

... received in the caulking seat 154.

Figs. 21 and 22 are perspective views showing the lipstick case 110A in decomposed condition, which correspond to Figs. 13 and 14. In the lipstick case 110A of the third embodiment, a belt 164A has a second sliding piece 179A on...K protruded from the sleeve 140A and ready for use.

As discussed above, in the **lipstick case** 110A of the third embodiment, the lifting mechanism 160A, which is similar to the lifting ...

- ...and detaching the cartridge unit 182A to and from the main body 120A of the lipstick case 110A. When the cartridge unit 182A is to be detached from the main body 120A...
- ...kept at its lower-most position. The sleeve 140A is further provided with a check projection 142, which holds the support member 150A in a stationary condition and enables the connection...130A to close the opening 122A of the main body 120A under such conditions, the lipstick case 110A can be returned to its initial state (similar to the state of Figs. 11(A) through 11(C)).

As discussed above, the <code>lipstick case</code> 110A of the third embodiment has the configuration of <code>projection</code>—recess engagement between the sleeve 140A and the main body 120A and between the support member 150A and the belt 164A, which is reverse to that of the <code>lipstick case</code> 110 of the second embodiment. The reverse configuration of <code>projection</code>—recess engagement can also realize the lifting mechanism 160A for quickly protruding the lipstick K...

...from a casing 190.

Fig. 23 is a perspective view illustrating the appearance of a lipstick case 110B of the fourth embodiment. The lipstick case 110B of the fourth embodiment includes a main body 120B with a lifting

- mechanism, which is similar to the lifting mechanism 160 of the lipstick case 110 of the second embodiment, and a casing 190 for receiving the main body 120B therein. In the drawing of Fig. 23, the main body 120B of the lipstick case 110B is being inserted into the casing 190. Unlike the lipstick case 110 of the second embodiment, in the lipstick case 110B of the fourth embodiment, a operating member 162B is freely detachable from a belt...
- ...the casing 190 via the engagement of the click 192 with the recess 194. In case that the lipstick K (not shown in Fig. 23) set in the lipstick case 110B has been used up, the user removes the operating member 162B from the casing...
- ...192 as the only protruded element to be readily inserted into and removed from the **casing** 190.

In the lipstick case 110B of the fourth embodiment, after the lipstick K has been used up, the main...

- ...with the attachment mechanism 180 of the second embodiment.

 The main body 120B of the lipstick case 110B of the fourth embodiment may include a lifting mechanism identical with the lifting mechanism of the second embodiment.
 - In the **lipstick** cases of the second through the fourth embodiments, the lifting mechanism (160, 160A) enables the lipstick...
- ...its upper end. After the upper end of the sleeve goes up beyond the ring projection formed on the cover, the lipstick K starts going up. This structure enables the lipstick K to be protruded...
- ...the cover and damaged. Since the sleeve goes up to the position beyond the ring projection of the cover, the cover does not come into contact with the lipstick K while the user applies the lipstick...
- ...K received in the main body. Even when a certain impact is applied on the **lipstick** case in carriage, the sleeve receiving the whole length of the lipstick K effectively protects the...
- ...The user can implement the series of operations quickly with only one finger. The engagement <code>pawl</code> formed on the ring <code>projection</code> of the <code>cover</code> is received in the engagement recess formed in the main body when the cover is...
- ...to check that the cover is securely closed. Once the cover is closed, the engagement <code>pawl</code> can keep the <code>cover</code> in closed position.

 In the above embodiments, the belt sliding groove, in which the belt...
- ...force. The moderate frictional resistance prevents the lipstick from being unintentionally protruded while requiring no **excessive force** for the sliding operation of the operating member. Since the resistance generated in the sliding...
- ...of the operating member is set in the predetermined range, the user can stop the **protrusion** of the lipstick at an arbitrary position. This allows a desired length of lipstick to...
- ...the lipstick. The user can thus apply the lipstick directly on the lips.

In the lipstick cases of the second through the fourth embodiments, the belt is used as the interlocking unit...

 \dots and the support member according to the shifted distance of the operating member.

In the **lipstick cases** of the above embodiments, the support member has a cup-like portion for supporting the...

 \dots accordance one possible structure, a cylindrical support member supports the lower side face of the ${f lipstick}$ K.

The lipstick cases of the second and the fourth embodiments have the lifting mechanism 160, whereas the lipstick case of the third embodiment includes the lifting mechanism 160A. Another configuration is also applicable to the projection -recess engagement between the sleeve and the main body and between the support member and...

...hole in the support member like the third embodiment.

The lifting mechanism incorporated in the lipstick cases of the second through the fourth embodiments transmits the vertical sliding movement of the operating...thereby enabling the lipstick to be protruded from the upper end of the sleeve. The protrusion of the lipstick can also be implemented by making the sliding rate of the lipstick...

...main body.

In the above embodiments, a separate cover attached to the opening of the lipstick case is press-opened by an upward movement of the sleeve. Instead of attaching the cover...

...or at any other desirable position on the main body.

In the above description, the lipstick cases for receiving the lipstick K therein are given as the first through the fourth embodiments. The principle of the...

...faces in the first through the fourth embodiments, the upper faces of the stick-type **cosmetic** preparations and their **cases** may have any other desirable shapes, such as horizontal.

There may be many other modifications...

...illustrative and not restrictive in any sense.

Industrial Application of the Invention

As discussed above, cases of stick-type cosmetic preparations and cartridges including stick-type cosmetic preparations according to the present invention can preferably...

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37/3, K/10
              (Item 10 from file: 348)
DIALOG(R) File 348: EUROPEAN PATENTS
(c) 2004 European Patent Office. All rts. reserv.
ROD-LIKE COSMETIC CONTAINER AND ROD-LIKE COSMETIC CARTRIDGE
STABFORMIGER KOSMETIKBEHALTER UND STABFORMIGE PATRONE FUR KOSMETIKA
RECIPIENT POUR PRODUIT COSMETIQUE DE TYPE BATON ET CARTOUCHE DE PRODUIT
    COSMETIQUE DE TYPE BATON
PATENT ASSIGNEE:
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    Nishi-ku, Nagoya-shi Aichi-ken 451, (JP)
LEGAL REPRESENTATIVE:
  Leckey, David Herbert (73221), Frank B. Dehn & Co., European Patent
    Attorneys, 179 Queen Victoria Street, London EC4V 4EL, (GB) = (US) 60/2863
PATENT (CC, No, Kind, Date): EP 791308 A1 970827 (Basic)
                              EP 791308 A1
                                             990120
                              EP 791308 B1 010314
                              WO 9709902 970320
                              EP 96921129 960627; WO 96JP1812 960627
APPLICATION (CC, No, Date):
PRIORITY (CC, No, Date): JP 95262205 950914; JP 96126358 960422; JP
    96150321 960521
DESIGNATED STATES: DE; ES; FR; GB; IT
RELATED DIVISIONAL NUMBER(S) - PN (AN):
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NOTE:
Figure number on first page: 2
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                           Update
                                     Word Count
      CLAIMS A
                (English)
                           199708W4
                                         3130
      CLAIMS B
                (English)
                           200111
                                        984
      CLAIMS B
                 (French)
                           200111
                                      1224
      SPEC A
                 (English)
                           199708W4
                                        20618
      SPEC B
                (English)
                           200111
                                     16739
Total word count - document A
                                      23752
Total word count - document B
                                     18947
Total word count - documents A + B
                                     42699
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INTERNATIONAL PATENT CLASS: A45D-040/02 ... A45D-040/04

...SPECIFICATION 13 is a decomposed perspective view showing a part of the constituents of the lipstick case 110; and Fig. 14 is a perspective view showing the residual constituents of the lipstick case 110. The following describes the structure of the lipstick case 110 based on the drawings of Figs. 11 through 14, the structure and operation for realizing protrusion of the lipstick K from the lipstick case 110, and the structure and operation for realizing attachment and detachment of the predetermined section including the lipstick K.

Referring to Figs. 11 through 14, the lipstick case 110 includes a cylindrical main body 120 having a bottomed tube 120a, a cover 130 attached to the main body 120, a sleeve 140 slidably accommodated in the

bottomed...

- ...form an inclined opening 122. In the description below, the opening end 122 of the lipstick case 110 is referred to as the upper side and the bottomed end as the lower...
- ...120a is arranged on the upper end of the inclined opening 122, and an attachment **projection** 135 below the attachment groove 134. An guide cut 136 is formed at the intermediate...
- ...gradually decreased towards the inside of the tube 120a. The attachment groove 134, the attachment **projection** 135, and the guide cut 136 are constituents relating to the attachment and detachment of...
- ...which is constructed by inserting the horizontal shaft 131b into a through hole of a **protrusion** 131a formed at a predetermined position in the vicinity of the circumference of the cover...
- ...supported by the hinge 131 to freely open and close the opening 122 of the tube 120a. The cover 130 is press-opened by means of the upper end of the sleeve 140 to enable the lipstick K to be protruded from the lipstick case 110 as discussed below. The hinge 131 is structured to apply a predetermined resistance at...
- ...the cover 130 to be opened and held at a desirable angle.

 An inclined ring projection 132, which is extended from the bottom face of the cover 130, is fitted in the inclined opening 122 when the cover 130 is in closed position. An engagement pawl 132a is arranged at a predetermined position on the side face of the inclined ring projection 132 of the cover 130. When the cover 130 is in closed position, the engagement pawl 132a is received in an engagement recess 133a, which is formed at a corresponding position inside the opening 122 of the main body 120. Engagement of the engagement pawl 132a with the engagement recess 133a and its release ensure a moderate touch when the
- ...174, the guide groove 178, and the second sliding piece 179 are constituents involved in **protrusion** of the lipstick K from the **lipstick** case 110 and described later in a greater detail.

 The lifting mechanism 160 realizes the **protrusion** of the lipstick K from the **lipstick** case 110. The lifting mechanism 160 includes a operating member 162, a belt 164, the cam...
- ...lifting mechanism 160 as well as the operation of protruding the lipstick K from the lipstick case 110.

 The user operates the operating member 162 with a finger to enable the lipstick K to be protruded from and accommodated into the lipstick case 110. The operating member 162 is fitted in a control slot 120d (see Figs. 13...
- ...164a within a predetermined desirable range.
 - When the lipstick K is thoroughly accommodated in the lipstick case 110, the operating member 162 is ...the position shown in Fig. 11(D)), the lipstick K is gradually protruded from the lipstick case 110. At this moment, a second end of the belt 164 slides along the belt...the user operates the operating member 162 to make the lipstick K protruded from the lipstick case 110. Fig. 17 shows a series of movements of the lifting mechanism 160 in the course of operation for protruding the lipstick K from the lipstick case 110. More concretely, the drawing of Fig. 17 shows the engagement state of the first...

- ...of the second sliding piece 179 with the guide groove 178, and the state of **protrusion** of the sleeve 140 and the lipstick K corresponding to the respective positions of the...
- ...on the plane.

In the state of Fig. 11(B), the opening 122 of the **tube** 120a is closed with the **cover** 130, and the lipstick K is thoroughly accommodated in the main body 120. Under such...

...distance, the upper end of the lifted sleeve 140 comes into contact with the ring projection 132 of the cover 130. When the user further slides down the operating member 162, the upper end of the sleeve 140 press-opens the cover 130 and goes up beyond the ring projection 132, so that the sleeve 140 is protruded from the opening 122 of the main... ...cover 130 to close the opening 122 of the main body 120 and return the lipstick case 110 to the initial state (corresponding to the state of Figs. 11(A) through 11(C)).

The lipstick case 110 having the lifting mechanism 160 discussed above is further provided with the attachment mechanism...

...by a new lipstick K. The following describes the attachment mechanism 180 included in the **lipstick case** 110 of the second embodiment and a concrete procedure of attaching and detaching the lipstick K to and from the **lipstick case** 110.

The mechanism and process of detaching the predetermined section including the lipstick K from the main body 120 are described first. In the lipstick case 110 of the second embodiment, the sleeve 140 and the support member 150 for supporting...

- ...to the shape of the attachment groove 134 before coming into contact with the attachment **projection** 135 (see Figs. 13 and 14). When the sleeve 140 is further pressed in, the second sliding piece 179 goes over the attachment **projection** 135 and reaches the position in the vicinity of the connection hole 175 formed in...
- ...back by the resilience of the second leaf spring 177 when going over the attachment **projection** 135. This enables the second sliding piece 179 to be fitted into the connection hole...
- ...cover 130 to close the opening 122 of the main body 120 and return the lipstick case 110 to the initial state (corresponding to the state of Figs. 11(A) through 11(C)).

In the lipstick case 110 of the second embodiment thus constructed, a simple sliding operation of the operating member...

- ...unit 182 to and from the main body 120 according to the requirements. In the lipstick case 110 of the second embodiment, the cartridge unit 182 is linked with the main body...
- ...while the second sliding piece 179 is fitted in the horizontal slot 178a. The attachment **projection** 135 formed on one end of the attachment groove 134 as well ...179 is kept in the horizontal slot 178a of the guide groove 178.

In the lipstick case 110 of the second embodiment, the cartridge unit 182 is attached to the main body...

...contact with the exterior but is kept under preferable sanitary conditions. The structure of the <code>lipstick case</code> 110 of this embodiment further allows the cartridge unit 182 to be attached without significant ...upward sliding movement of the operating member 162 moves the sleeve

- 140 down in the **tube** 120a and enables the **cap** 185 to be removed from the sleeve 140 at a predetermined position. In case that:..
- ...130 to close the opening 122 of the main body 120 under such conditions, the lipstick case 110 can be returned to its initial state (corresponding to the state of Figs. 11...
- ...may come into contact with the inner wall of the cap 185.

 In the lipstick case 110 of the second embodiment, the cartridge unit 182 has the first sliding piece 174...
- ...connection hole 175 of the belt 164 on the main body 120. This configuration of projection -recess engagement may, however, be reversed according to the requirements. Another lipstick case 110A having a lifting mechanism 160A with the reverse configuration of projection -recess engagement to that of the lipstick case 110 of the second embodiment is described as a third embodiment according to the invention. lipstick case 110A of the third embodiment has similar structure to that of the lipstick case 110 of the second embodiment except the configuration of **projection** -recess engagement. The symbol 'A' is added to the numerals representing the constituents of the lipstick 110A, which are identical with or correspond to those of the lipstick case 110. Such constituents may not be specifically described here. The case 110A of the third embodiment has substantially the same appearance as that of the lipstick case 110 shown in Fig. 11. Fig. 20 is a decomposed perspective view illustrating a main body 120A,

Fig. 20 is a decomposed perspective view illustrating a main body 120A, a sleeve 140A, and a support member 150A of the lipstick case 110A. While the sleeve 140 of the second embodiment has the guide groove 178 and...

... received in the caulking seat 154.

Figs. 21 and 22 are perspective views showing the lipstick case 110A in decomposed condition, which correspond to Figs. 13 and 14. In the lipstick case 110A of the third embodiment, a belt 164A has a second sliding piece 179A on...K protruded from the sleeve 140A and ready for use.

As discussed above, in the lipstick case 110A of the third embodiment, the lifting mechanism 160A, which is similar to the lifting ...

- ...and detaching the cartridge unit 182A to and from the main body 120A of the **lipstick case** 110A. When the cartridge unit 182A is to be detached from the main body 120A...
- ...kept at its lower-most position. The sleeve 140A is further provided with a check **projection** 142, which holds the support member 150A in a stationary condition and enables the connection...130A to close the opening 122A of the main body 120A under such conditions, the **lipstick** case 110A can be returned to its initial state (similar to the state of Figs. 11(A) through 11(C)).

As discussed above, the <code>lipstick case</code> 110A of the third embodiment has the configuration of <code>projection</code> -recess engagement between the sleeve 140A and the main body 120A and between the support member 150A and the belt 164A, which is reverse to that of the <code>lipstick case</code> 110 of the second embodiment. The reverse configuration of <code>projection</code> -recess engagement can also realize the lifting mechanism 160A for quickly protruding the lipstick K...

...from a casing 190.

Fig. 23 is a perspective view illustrating the appearance of a

- lipstick case 110B of the fourth embodiment. The lipstick case
 110B of the fourth embodiment includes a main body 120B with a lifting
 mechanism, which is similar to the lifting mechanism 160 of the lipstick
 case 110 of the second embodiment, and a casing 190 for receiving the
 main body 120B therein. In the drawing of Fig. 23, the main body 120B of
 the lipstick case 110B is being inserted into the casing 190.
 Unlike the lipstick case 110 of the second embodiment, in the
 lipstick case 110B of the fourth embodiment, a operating member 162B
 is freely detachable from a belt...
- ...the casing 190 via the engagement of the click 192 with the recess 194. In case that the lipstick K (not shown in Fig. 23) set in the lipstick case 110B has been used up, the user removes the operating member 162B from the casing...
- $\dots 192$ as the only protruded element to be readily inserted into and removed from the <code>casing 190</code>.

In the lipstick case 110B of the fourth embodiment, after the lipstick K has been used up, the main...

...with the attachment mechanism 180 of the second embodiment.

The main body 120B of the lipstick case 110B of the fourth embodiment may include a lifting mechanism identical with the lifting mechanism 120 of the second embodiment.

In the **lipstick cases** of the second through the fourth embodiments, the lifting mechanism (160, 160A) enables the lipstick...

- ...its upper end. After the upper end of the sleeve goes up beyond the ring projection formed on the cover, the lipstick K starts going up. This structure enables the lipstick K to be protruded...
- ...the cover and damaged. Since the sleeve goes up to the position beyond the ring **projection** of the **cover**, the **cover** does not come into contact with the lipstick K while the user applies the lipstick...
- ...K received in the main body. Even when a certain impact is applied on the lipstick case in carriage, the sleeve receiving the whole length of the lipstick K effectively protects the...
- ... The user can implement the series of operations quickly with only one finger. The engagement <code>pawl</code> formed on the ring <code>projection</code> of the <code>cover</code> is received in the engagement recess formed in the main body when the cover is...
- ...to check that the cover is securely closed. Once the cover is closed, the engagement <code>pawl</code> can keep the <code>cover</code> in closed position.

 In the above embodiments, the belt sliding groove, in which the belt...
- ...force. The moderate frictional resistance prevents the lipstick from being unintentionally protruded while requiring no **excessive force** for the sliding operation of the operating member. Since the resistance generated in the sliding...
- ...of the operating member is set in the predetermined range, the user can stop the **protrusion** of the lipstick at an arbitrary position. This allows a desired length of lipstick to...
- ...the lipstick. The user can thus apply the lipstick directly on the lips.

In the lipstick cases of the second through the fourth embodiments, the belt is used as the interlocking unit...

 \dots and the support member according to the shifted distance of the operating member.

In the lipstick cases of the above embodiments, the support member has a cup-like portion for supporting the...

 \dots accordance one possible structure, a cylindrical support member supports the lower side face of the ${f lipstick}$ K.

The lipstick cases of the second and the fourth embodiments have the lifting mechanism 160, whereas the lipstick case of the third embodiment includes the lifting mechanism 160A. Another configuration is also applicable to the projection -recess engagement between the sleeve and the main body and between the support member and...

...hole in the support member like the third embodiment.

The lifting mechanism incorporated in the lipstick cases of the second through the fourth embodiments transmits the vertical sliding movement of the operating...thereby enabling the lipstick to be protruded from the upper end of the sleeve. The protrusion of the lipstick can also be implemented by making the sliding rate of the lipstick...

...main body.

In the above embodiments, a separate cover attached to the opening of the lipstick case is press-opened by an upward movement of the sleeve. Instead of attaching the cover...

...or at any other desirable position on the main body.
In the above description, the <code>lipstick</code> cases for receiving the <code>lipstick</code> K therein are given as the first through the fourth embodiments. The principle of the...

...faces in the first through the fourth embodiments, the upper faces of the stick-type **cosmetic** preparations and their **cases** may have any other desirable shapes, such as horizontal.

There may be many other modifications...

...illustrative and not restrictive in any sense.

Industrial Application of the Invention
As discussed above, cases of stick-type cosmetic preparations and cartridges including stick-type cosmetic preparations according to the present invention can preferably...

37/3,K/18 (Item 18 from file: 349) DIALOG(R) File 349: PCT FULLTEXT (c) 2004 WIPO/Univentio. All rts. reserv. 00297551 PROTECTIVE UNDER-CAP AND METHOD FOR LIPSTICK SOUS-CAPUCHON DE PROTECTION ET PROCEDE POUR ROUGE A LEVRES Patent Applicant/Assignee: MAYBELLINE INTERMEDIATE CO, Inventor(s): FORD John M B, LUND Doug M, O'BRIEN Bernard M, Patent and Priority Information (Country, Number, Date): (US) 545/1/3
Patent: WO 9515702 Al 19950615 WO 9515702 A1, 19950615 Application: WO 94US14110 19941209 (PCT/WO US9414110) Priority Application: US 93164712 19931210 Designated States: (Protection type is "patent" unless otherwise stated - for applications prior to 2004) AT AU BB BG BR CA CN CZ EE FI HU JP KP KR LT LV NO NZ PL RO RU SK VN AT BE CH DE DK ES FR GB GR IE IT LU MC NL PT SE Publication Language: English Fulltext Word Count: 5323 Main International Patent Class: A45D-040/00 Fulltext Availability: Detailed Description Claims English Abstract ...comprises a transparent, molded under-cap (10) which fits over the open end of a lipstick type case (2) from which a lipstick or other

- similar waxy mass (4) is propelled, and which...
- ...the lipstick (4). In this manner, the lipstick cap (5) may be removed from the lipstick case (2) to view the lipstick (4) while the under-cap (10) remains in place to...

Detailed Description

... a shrink band,

applied over the junction between the cap and the body of housing . Although it is well known to provide a lipstick with a transparent cap as shown...

...when the cap

is made from an opaque material to match the rest of the lipstick case , it is impossible for the prospective purchaser to determine the exact shade of the lipstick...

... view the lipstick mass to avoid inadvertent damage to the lipstick mass. Removal of the cap of a lipstick view the color of the lipstick also removes any physical or mechanical barrier to operation of the propelling mechanism. In addition, some lipstick case designs permit operation of the propelling mechanism with the cap in place in which case the lipstick mass may be inadvertently driven against the inside of the cap causing damage to the lipstick mass. In the case of carded lipsticks it is also desired to be able to view the actual color of the

lipstick...The invention comprises a transparent, molded undercap which fits over the open end of a lipstick or similar case from which the lipstick or other waxy mass is propelled and which engages a shoulder of the case, Preferably...

- ...in an alternative embodiment, the shoulder is that which immediately surrounds the base of the <code>lipstick tube</code>. The undercap is sized to fit snuggly within the lipstick cap yet permit the cap...
- ...which is substantially identical to that of the cap so as to form an even closure with the lipstick case whereby a tamper indicating or resistant means, such as an adhesive tape or a shrink...
- ...and seal the
 lipstick. In this manner, the lipstick cap may be
 removed from the lipstick case to allow viewing of the
 lipstick while the undercap remains in place to protect
 the lipstick, Furthermore, where the lipstick case has a
 polygonal cross section, molding the undercap to fit the
 lipstick case in this manner also serves to prevent
 actuation of the propelling mechanism, even when the...
- ...cap is removed, since the undercap will provide resistance to the relative rotation of the lipstick case and the lipstick tube thereby preventing the lipstick mass from being propelled out of the lipstick case to where it may contact the inside of the cap or undercap and sustain damage. Alternatively, the case and undercap may be provided with other means, such as cooperating detents, whereby the case and undercap are held in position relative to each other and actuation...
- ...a further alternative, the tamper resistant means provides sufficient resistance to deter rotation of the lipstick tube and undercap relative to the lipstick case.

BRIEF DESCRIPTION OF THE DRAWING FIGURES Figure 1 is an exploded plan view of a... ... embodiment of figure 9 with the cap in place.

DETAILED DESCRIPTION OF THE INVENTION

A lipstick 1 comprises a case body 2, a
lipstick tube 3, a lipstick mass 4 and a cap 5, All of
these elements are arranged along a common longitudinal
axis as shown in figure 1 so as to be substantially
coaxial. Lipstick tube 3 extends outward from one end of
case body 2 and houses lipstick mass 4...

...extended and retracted, The propelling mechanism is actuated by means of the relative rotation of case body 2 and tube 3. Cap 5 is placed over the open end of tube 3 when lipstick mass 4 is retracted to close the lipstick 1.

Preferably case body 2 has a larger cross

section than tube 3 and may be the sameIn the preferred embodiment, tube 3 has a circular cross section while case body 2 and cap 5 have a preferably rectangular cross section, as shown in figures 5 and 6, However, other polygonal shapes may be employed for case body 2 and cap 5 with success in the present invention.

Alternative embodiments of the present invention are also applicable to lipstick cases having round cross sections.

Between case body 2 and tube 3 is a shoulder 6...

- ...a skirt portion 8 which forms a trim band at the upper end 9 of case body 2.
 - A lipstick will often be provided with a label on the end of case body 2 or cap 5 to designate the color of lipstick mass 4. However, it is desirable for the...
- ...making cap 5 out of a transparent material thus resulting in a distinct contrast between **case** body 2 and **cap** 5. or packaging lipstick I in a blister type package with cap 5 removed so...
- ...where the lipstick is a high end product, In such instances it is preferred that case body 2 and cap 5 be opaque and of the same color. The third option is undesireable from the...
- ...in such blister type packaging.

The present invention provides undercap 10 which is interposed between **case** 2 and **cap** 5 and which is sealable to case 2 to provide the necessary protection to lipstick...

- ...that the color of the lipstick mass 4 may be directly observed. Furthermore, it allows **case** body 2 and **cap** 5 to be opaque and the same color thereby providing an aesthetically pleasing package while...
- ...the need for blister type packaging.

Undercap 10 comprises a molded body which fits over tube 3 and lipstick mass 4 and is substantially receivable within cap 5, The preferred form of undercap 10...portion 16 of undercap 10 has a shape and size which corresponds to that of cap 5 and of case body 2. Accordingly, when undercap 10 and cap 5 are in place on case body 2 they will have the arrangement as seen in figures 2 and 5 with lower portion 16 of undercap 10 holding cap 5 out of engagement with case body 2, The advantage of this arrangement will become evident hereinafter, In this arrangement lower...

...accomodate
 tube 3 while lower portion :

tube 3 while lower portion 16 has a polygonal shape and size corresponding to **case** 2 and **cap** 5.

Operation of the propelling mechanism of lipstick 1 is by means of relative rotation...

...3 with the other hand and twists them in opposite directions.

Generally, clockwise rotation of case body 2 extends
lipstick mass 4 and counter clockwise rotation of case 2
retracts lipstick mass 4. Resistance to such rotation
when cap ...such rotation,
Resistance to relative rotation may also be
provided by means such as cooperating detents on undercap
10 and case body 2. Such alternative means are shown in
figure 8 where the undercap 10 is shown in combination
with a lipstick 1 having a case body 2 and cap 5 which
have a round cross section, In such a lipstick, the
engagement of lower...

- embodiment of figure 8, undercap 10 is provided with inwardly extending detents 18 in lower portion 16 of skirt 12. Detents 18 fit into and engage recesses 19 which are part of shoulder 6. This order of position of detents 18 and recesses 19 may be reversed so that detents 18 are part of shoulder 6 and recesses 19 are molded in as part of undercap 10. Preferably, at least two each of detents 18 and recesses 19 are provided at positions which are 1800 opposite, However, any number of such cooperating detents and recesses, or other cooperating means may be employed. Cooperating detent means may also be used where undercap 10 and case 2 have cooperating polygonal cross...
- ...By molding lower portion 16 of undercap 10 to correspond in shape and size to case 2 and cap 5. not only does undercap 10 provide resistance to operation of the propelling mechanism of lipstick 1, but a smooth transition between case 2 and cap 5 is effected, as shown in figure 2, thus giving lipstick 1 a pleasing and...In this embodiment, mid-portion has a length which substantially corresponds to the length of lipstick tube 3 and has an interior dimension to fit snuggly over lipstick tube 3. As with the first embodiment of undercap 10, mid-portion 15 has an exerior...
- ...end 13 of
 undercap 101 engages step 61 of shoulder 6 at the base of
 lipstick tube 3 leaving shoulder 6 free to engage lower
 end 7 of cap 5, Thus, in...
- ...relative rotation of undercap 101 and case 2 which, in turn, prevents relative rotation of lipstick tube 3 and case 2 when cap 5 is removed to view lipstick mass 4, As with the other embodiments, sealing means...
- ...is normal for the inside of lipstick cap 5 to be provided with molded friction detents (not shown) which engage the outer surface of lipstick tube 3 and provide a snug fit of cap 5 on case 2, In order to

facilitate such a snug fit with the undercap of the present...

...15 and are of a length which substantially corresponds to the length of the friction detents in cap 5, Apertures 25 expose a portion of lipstick tube 3 for 5 engagement with the friction detents of cap 5.

Figures 5. 61 7 and 11 illustrate lipstick I in different packaging embodiments for...become separated from supporting cards 23.

in the case of the embodiment of figure 6, lipstick tube 3 may be manufactured from a transparent material, thus permitting the lipstick mass to be...

Claim

- body, a central tube extending in a longitudinally
 3 coaxial relationship from said body, a cap fittable over
 4 said tube and engagable with said body, a waxy mass
 5 housed within said tube and said...
- ...body and removably receivable within said cap whereby said protective undercap is intermediate between said cap and said tube whereby said cap is removable while said protective undercap remains in place over said tube and said mass...
- ...strip wrapped about said body and said protective undercap over the juncture therebetween.
 - 9 The apparatus of claim 6 wherein said cap is removable therefrom without disrupting said tamper resistant means.
- 10 The apparatus of claim 6...
 ...means whereby relative rotation of said protective
 undercap and said body is resisted comprises cooperating
 detents on said undercap and said case body.
 - 12 The apparatus of claim 10 wherein said...
- ...polygonal cross section.
 - 14, The apparatus of claim 1 wherein said waxy
 mass is a cosmetic .
 - 15 The ${\it apparatus}$ of claim 14 wherein said cosmetic is a ${\it lipstick}$.

16 The apparatus of claim 1 wherein said waxy mass is a crayon.
17a The apparatus of claim 1 wherein said waxy mass is a theatrical make-up..
18* A protective mass cover for a lipstick having a case body, a lipstick mass propellable from said 'case body, propelling means to propel and retract said lipstick mass...
...mass, wherein said mass cover comprises a molded

transparent intermediate cover member placed over said
lipstick mass between said case body and said cap whereby
said cover member closes said case body and provides
protection for a lipstick mass therein while permitting
10 said cap to...

...thermo

formable plastic and has a cross sectional shape corresponding substantially to that of said lipstick case on which it is placed.

21 The protective mass cover of claim 20 wherein said...

...cap,

240 The protective mass cover of claim 18 further comprising cooperating means between said **cover** member and said **case** body whereby said propelling means is prevented from operating when said cover member is in place.

25 The protective mass cover of claim 24 wherein said cooperating means comprises cooperating detents on said cover member and said case body.

26 The protective mass **cover** of claim 24 wherein said cooperating means comprises engaging surfaces of said **cover** member and said **case** body wherein said **case** body and said **cover** member each have an identical polygonal cross section.

270 A method for sealing and protecting...

...tube in said

longitudinally coaxial relationship by relative rotation of said body and said mass tube, and a cap receivable over said mass tube and engagable with said body in said longitudinally coaxial relationship, the method comprising: providing said...

...mass retracted within said mass tube, providing a protective undercap telescopically receivable over said mass tube and within said cap and engagable with said body, placing said protective undercap over said mass tube, releasably sealing...skirt depending from said endwall, said skirt having a longitudinal dimension greater than said mass tube and less than said cap and an opening opposite said endwall having a cross sectional size and shape at least...

...is prevented.

32* The method of claim 31 wherein said means engaging said body comprises **detents** engaging corresponding structures on said body.
330 The method of claim 27 wherein said waxy...

37/3,K/20 (Item 20 from file: 349)

DIALOG(R) File 349: PCT FULLTEXT

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00231424 **Image available**

FILL/INVERT PACKAGE WITH SPECIALIZED SEALING, NON-FLOW-THROUGH ELEVATOR SYSTEM

EMBALLAGE DU TYPE A REMPLISSAGE ET A RETOURNEMENT, COMPRENANT UN SYSTEME DE LEVAGE SANS FUITE ET A ETANCHEITE PARTICULIERE

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Fulltext Availability: Detailed Description Claims

Detailed Description

... is yet another object of the present invention to provide a process for making a **cosmetic** stick in the **container** set forth above using a fill/invert method.

SUMMARY OF THE INVENTION

In accordance with...effectiveness of line seal 61 by compensating for molding tolerances.

Spindle 19 further includes annular rib 68 which exerts a compressive force against wall 69 of central hub 35. Annular rib 68 can act both as a secondary seal for the hub/threaded shaft interface and...

...the consumer is

undesirable since it will jeopardize the effectiveness of the point seal 61. Rib 68 can be intermittent if it is to serve only as a brake or continuous...

Claim

- ... in its lowermost position the edges of said stepped bore
 are compressing against said tapered annular rim
 ?0 continuously along its circumference.
 - 7 The package of Claim 6 wherein said spindle includes an intermittent annular ring, said...elevator from creeping up prior to use,
 - 8 The package of Claim 6 wherein said annular ring is

continuous so that it acts to further seal said hub/threaded shaft
interface,

9 A process...

f

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SERSION CATION
37/3.K/29
              (Item 29 from file: 348)
DIALOG(R) File 348: EUROPEAN PATENTS
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01417810
Cosmetic container
Kosmetikbehalter
Boitier pour produit cosmetique
PATENT ASSIGNEE:
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Available Text Language Update Word Count CLAIMS A (English) 200216 1241 SPEC A (English) 5556 200216 Total word count - document A 6797 Total word count - document B Ω Total word count - documents A + B 6797

INTERNATIONAL PATENT CLASS: A45D-040/06 ...

... A45D-040/00

- ...SPECIFICATION 162 at each space between two adjacent annular ridges 161. Apart from the features regarding lower swell 16, these embodiments shown in Figs. 4 and 5 are substantially identical to the embodiment...

 ...the above-described embodiments, when cap 11 is placed onto insert sleeve 7, annular external ridge 8 is first positioned in contact with knurling inside surface 18 of inner cap member 12, as best seen in Fig. 1(B). Then, by applying a downward force F to cap 11, lower swell 16 climbs over ridge 8, as shown in Fig. 2(B) so that inner cap member 12 comes to a standstill in a completely capped condition. In this condition, ridge 8 rests at elastic portion 15 which is easily deformed to be tightly adhered to ridge 8, thereby providing an improved air-tight property to container 10. Accordingly, when container 10...
- ...it prevents the volatile cosmetic material from deterioration over a longer period of time. Upper **swell** 17 is less deformable and therefore acts as a stopper for preventing excessive **insertion** of **insert** sleeve

- 7. Lower swell 16 acts as another stopper for preventing inadvertent removal of cap 11. Since elastic portion 15 is simply formed as...
- ...if there is some displacement in engagement between cap 11 and inner cap member 12, ridge 8 is surely positioned in press-contact with this portion 15 in the capped condition...
- 16 climbs over ridge 8 of insert sleeve 7 during insertion of cap 11 onto the top of insert sleeve 7. Lower swell 16 comprises a series of spaced annular ridges 161, which facilitate enlargement of inner cap member during capping operation. This also decreases a capping operation force F and contributes to smooth insertion of cap 11. After lower swell 16 has climbed over ridge 8, it will be readily restored to its original diameter due to semi-spherical projections 162 positioned in each space between two adjacent annular projections 161, thereby improving air-tightness of container 10. Elastic portion 15 having upper and lower...
- ...areas and a thinner middle area is well deformable and restorable to air-tightly receive ridge 8.

The elastic portion 15 formed between upper and lower swells 17, 16 has a smooth inner surface extending over a sufficient axial length, during which ridge 8 of insert sleeve 7 may surely be positioned in a capped condition, even if...

...body 1 and increases air-tightness of container 10.

In the above-described embodiments, lower swell 16 is formed not as a continuous annular projection but as a series of spaced annular ridges 161, which allows ridge 8 to have a wide variety of its diameter. Should the lower swell 16 comprise a continuous annular projection, it is necessary that ridge 8 has a definite diameter which is determined in relation to an inner diameter of inner cap member 12.

Ridge 8 having a large diameter is difficult to climb over lower swell 16 which prevents smooth capping and uncapping operation, whereas ridge 8 having a smaller diameter can not attain air-tight engagement between inner sleeve 7...

...cap member 12.

In the first embodiment in which lower swell 16 includes semi-spherical projections 162, there is a relatively wide space between adjacent annular projections 161, 161, which facilitates inner cap member 12 to be elastically enlarged for smooth capping operation. In the embodiment of Fig. 4, semi-spherical projections 162 comes into contact with the inner surface of cap 11 in a capped condition, which further improves air-tightness.

Fig. 6 shows another example of lower swell 16 according to the first embodiment of the present invention, comprising three, equally spaced, annular ridges 161 formed around the outer surface of inner cap member 12 and connecting ribs 163 each connecting two adjacent annular ridges 161 one another. Each connecting rib 163 is narrower and shorter than annular projection 161 and has a semi-spherical cross-section. Spaced above and below each connecting rib 163, there are auxiliary semi-spherical ribs 164, 164 in parallel relation therewith. Apart from these features, the embodiment of Fig. 6...

... to the embodiment of Fig. 3.

In a modification of Fig. 7, both of connecting ribs 163 and auxiliary ribs 164 is substantially equal in height to annular ridges

- 161. Apart from this feature, this embodiment is similar to the embodiment of Fig. $6\dots$
- ...with Figs. 3-5. Inner cap member 12 is easily deformable and expandable because lower swell 16 comprises a series of spaced annular ridges 161.

 Upper and lower auxiliary ribs 164, 164 cooperate with connecting rib 163 to further improve air-tightness of container 10. Specifically, upper rib 164 adsorbs vertical offset of annular projection or ridge 8 of insert sleeve 7 with respect to inner cap member 12 in a capped...
- ...the first embodiment of the present invention, wherein lower swell 16 comprises three, equally spaced, annular ridges 161 formed around the outer surface of inner cap member 12 and connecting parts 165 each connecting two adjacent annular ridges 161 one another. Each connecting part 165 has width and height both substantially equal to annular projection 161 and has a lower cut-out portion 165a providing a slanting bottom surface. Spaced above and below each connecting part 165, there are auxiliary ribs 164, 164 of semi-spherical cross-section in parallel relation therewith. Apart from these features...
- ...in connection with Figs. 3-5. In addition, since each connecting part 165 of lower swell 16 has lower cut-out portions 165a, 165b, 165c, when ridge 8 of insert sleeve 7 becomes in press-contact with the outer surface of lower swell 16 during capping, an upper portion 165' tends to be inclined inwardly (that is, toward insert sleeve 7) as shown...
- ...the capping operation force F to be requi-ed when lower swell 16 climbs over ridge 8 of insert sleeve 7 during capping and, therefore, facilitate smooth engagement therebetween. Connecting parts 165 having the same height with annular projections 161 are well adhered to the inner surface of cap 11 in a capped condition...
- ...15 illustrates some examples according to a second embodiment of the present invention wherein lower swell 16 is formed to have a wavy periphery in horizontal cross-section. In an example of Fig. 11, as best seen in Fig. 11(D), lower swell 16 has a wavy periphery 16a comprising a continuous curved edge having regularly repeated tops and bottoms. In this example, lower swell 16 is an endless annular projection. Lower swell 16 has an arcuate cross-section 16b in its axial direction, as best seen in Fig. 11(E).

In a modified example shown in Fig. 12, the wavy **periphery** 16a of lower **swell** 16 includes flat sections 16c at the top. In a further modification, the wavy periphery...

...though not specifically shown.

In a still modified example shown in Fig. 13, the wavy **periphery** of lower **swell** 16 is formed as a milled edge 16d having regularly repeated tops and bottoms.

In a still modified example shown in Fig. 14, the wavy periphery of lower swell 16 is formed as a series of arcs 16e of the same diameter.

In these examples, there may be a plurality of protrusions 166 extending between lower swell 16 and a lower end 19 of inner cap member 12, as shown in Fig. 15. Although the upper end of each protrusions 166 is merged into a top 16m of the wavy periphery 16a of lower swell 16, it may also be ...the first embodiment.

In accordance with the second embodiment of the present invention, while lower swell 16 is formed as a continuous annular projection, its wavy periphery in radial cross-section facilitates elastic deformation or enlargement of lower swell 16 when insertion of inner

 ${\tt cap}$ member 12, thereby decreasing the capping operation force F and smoothening engagement of cap 11...

- ...readily be returned to its original configuration because lower swell 16 is a continuous annular **projection**, which provides an improved air-tightness of container 10. When longitudinal protrusions 166 extend downward from lower **swell** 16 as in the example of Fig. 15, engagement of cap 11 with main body 1 may be maintained even if lower **swell** 16 do not have a sufficient axial length, which prevents inadvertent separation of cap 11...
- ...improves air-tightness of container 10.

 In the second embodiment of the present invention, when elastic portion 15 has a thinned wall area at the middle, the capping operation may further be smoothened, as having been described...
- ...portion 15 may readily be returned to its original configuration to become close contact with **ridge** 8 of insert sleeve 7, which further improves air-tightness of container 10. The elastic portion 15 formed between upper and lower **swells** 17, 16 has a smooth inner surface extending over a sufficient axial length, during which **ridge** 8 of insert sleeve 7 may surely be positioned in a capped condition, even if ...
- ...with respect to main body 1 and increases air-tightness of container 10.

Although lower swell 16 in each example of the second embodiment is shown as a continuous annular projection, it may be a series of several spaced annular projections, as shown in the examples of the first embodiment of Figs. 1-10.

Figs. 16...

- ...spaced, axial or longitudinal protrusions 166 extend between a lower swell 16 formed as an **endless continuous** annular **projection** or **ring** of **circular** cross-section and a lower end 19 of inner cap member 12. Apart from the feature regarding axial **protrusions** 166, the third embodiment is similar to the second embodiment (Fig. 15).

 Figs. 17 and...
- ...Fig. 16. In a modification of Fig. 17, lower swell 16 comprises three spaced annular **projections**. In a modification of Fig. 18, lower **swell** 16 comprises a plurality of spaced annular segmental **projections**, each being connected to one of axial **protrusions** 166.

The third embodiment of the present invention have the same advantages and functions as...

...connection with first and second embodiments. Due to axial protrusions 166 extending downward from lower swell 16, engagement of cap 11 with main body may be maintained even if lower swell 16 do not have a sufficient axial length, which prevents inadvertent separation of cap 11 from main body 1 and further improves air-tightness of container 10. When lower swell 16 is formed as a continuous annular projection, once cap 11 is fitted, inner cap member 12 will readily be returned to its original configuration, which provides an improved air-tightness of container 10. When lower swell 16 is formed as a series of spaced annular segmental projections, inner cap member 12 is easy to be enlarged during capping operation.

Although preferred embodiments of the...

...scopes of the present invention as defined in the appended claims. For example, when lower **swell** 16 is formed as a series of spaced annular segmental **projections**, the number of segmental **projections** may vary

as desired. Segmentation may be made equally or unequally. Each segmental projection may have different length and/or cross-section. Likewise, the number, height and arrangement of semi-spherical projections 162 or connecting ribs 163 may be determined in a wide variety of option. In the examples of Figs. 6-10, either one or both of upper and lower auxiliary ribs 164 may be omitted.

Although lower swell 16 and upper swell 17 of inner cap member 12 may have any desired axial cross-section, they preferably have a rectangular cross...

...portion as shown in the illustrated embodiments. Elastic portion 15 may be thicker than upper **swell** 17. Axial **protrusions** 166 may extend downwardly from lower **swell** 16 in the first embodiment.

Inner cap member 12 may have any desired shape, as far as it has elastic portion 15 between upper swell 17 and lower swell 16. For example, a portion above upper swell 17 of inner cap member 12 may be inwardly thickened. In this embodiment, the inwardly thickened portion comes into...

...is thinned, which facilitates engagement of cap 11 with main body 1. The shape of ridge 8 of inner sleeve 7 is optional. The number of ridge 8 may be determined as desired. Ridge 8 may comprise an upper ridge and a lower ridge. In this embodiment, in a capped condition, the lower ridge engages with elastic portion 15 of inner cap member 12 whereas the upper ridge is positioned above upper swell 17. In other words, lower swell 16, lower ridge, upper swell 17 and upper ridge are arranged in a zigzag alignment, which provide favorable air-tightness of container 10.

The cosmetic container of the present invention is generally cylindrical but its shape, size and material is not limitative. The cosmetic container of the present invention is particularly used as a lipstick container but may be used for receiving any cosmetic material that is volatile or not.

In accordance with the cosmetic **container** of the present invention, it is possible to improve air-tightness of the container in a capped condition. Moreover, the cosmetic **container** of the present invention provides an improved air-tightness while assuring easy capping operation.

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37/3, K/34
               (Item 34 from file: 348)
DIALOG(R) File 348: EUROPEAN PATENTS
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01114992
Cosmetic container
Behalter fur Kosmetische Produkte
Conteneur pour produit cosmetique
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    designated states: all)
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PATENT (CC, No, Kind, Date): EP 976344 A2 000202 (Basic) (US) 6070725
                               EP 976344 A3
                                             020327
                               EP 976344 B1
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APPLICATION (CC, No, Date):
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PRIORITY (CC, No, Date): JP 98193608 980625
DESIGNATED STATES: DE; FR; GB; IT
EXTENDED DESIGNATED STATES: AL; LT; LV; MK; RO; SI
INTERNATIONAL PATENT CLASS: A45D-040/00; B43K-023/08
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FULLTEXT AVAILABILITY:
Available Text
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      CLAIMS A
                (English)
                           200005
                                        294
      CLAIMS B
                (English)
                           200340
                                        300
      CLAIMS B
                 (German)
                           200340
                                        297
      CLAIMS B
                 (French)
                           200340
                                        340
      SPEC A
                (English)
                           200005
                                      1549
      SPEC B
                (English)
                           200340
                                      1545
Total word count - document A
                                      1843
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INTERNATIONAL PATENT CLASS: A45D-040/00 ...

...SPECIFICATION Field of the Invention

The present invention relates to a cosmetic container such as lipstick container. More particularly, the present invention relates to a cosmetic container comprising a housing assembly and a cap assembly with an inner cap member fittable onto the housing assembly

2482

Description of the Prior Art

Total word count - document B

Total word count - documents A + B

In the prior art cosmetic containers, the housing **assembly** includes an insert sleeve that is integrally fitted to the upper end portion of a ...

...body. The insert sleeve supports a stationary main body while allowing relative rotation therebetween. A **cosmetic** holder receiving a **lipstick**

is vertically slidably accommodated in the main body. The upper portion of the insert sleeve has an annular **projection** which is engaged within a corresponding annular groove of the inner **cap** member, when the **container** is capped.

However, in some case, the annular **projection** of the insert sleeve is positioned at a level somewhat offset from the position of...

...of the inner cap member in the capped condition. This could result from displacement in **assembling** the inner **cap** member to the outer cap member.

Furthermore, formation of the annular groove on the inner...

...practically difficult. When the annular groove do not satisfy a prescribed size requirement, the annular **projection** fails to be tightly engaged with the annular groove, thereby degrading air-tightness of the cosmetic **container**. Since most of recent cosmetic material is volatile, the cosmetic **container** is réquired to have a superior air-tightness, otherwise the cosmetic material received therein tends...

...of the present invention to overcome the drawbacks and disadvantages of the prior art cosmetic **container** .

Another object of the present invention is to provide a novel construction of a cosmetic **container** having an improved air-tightness in a capped condition.

According to an aspect of the present invention there is provided a cosmetic container comprising a housing assembly with an annular projection and a cap assembly with an inner cap member engageable with the annular projection, characterized in that the inner cap member has a thin wall portion defined between a pair of upper and lower annular external swells, the thin wall portion being deformed to provide air tight engagement with the annular projection when the housing assembly is capped with the cap assembly, the lower swell acting as a first stopper against removal of the cap assembly from the housing assembly whereas the upper swell acting as a second stopper against excessive insertion of the housing assembly into the cap assembly

In a preferable embodiment the **swells** of the inner **cap** member has rectangular cross-section.

In still another preferable embodiment, the annular **projection** of the housing assembly comprises a pair of spaced upper and lower annular **projections**.

In still another preferable embodiment, the inner cap member has a portion, below the lower **swell**, having a **knurling** inside wall. In still another preferred embodiment, the inner cap member has a portion, below the lower **swell**, having a thinner wall thickness.

BRIEF DESCRIPTION OF THE DRAWINGS

Other objects and advantages of ...

...when read in conjunction with the accompanying drawings in which:
Fig. 1A shows a lipstick container embodying the present invention
in an incompletely capped condition, a first half of which is...

...is an enlarged view showing "A" part in Fig. 1A;
Fig. 2A shows a lipstick container embodying the present invention in a completely capped condition, a first half of which is...

...same reference numbers throughout the drawings. Figs. 1A, 1B, 2A and 2B illustrate a cosmetic container embodying the

- present invention, in which it is in an incompletely capped condition in Figs...
- ...and 1B whereas in a completely capped condition in Figs. 2A and 2B. The cosmetic container 10 comprises, in general, a stationary tubular main body 1, a cosmetic holder 3 that is received in main body 1 and, in turn, accommodates a stick-like...
- ...has a pair of opposed vertically elongated slots 2, through which a pair of opposed **projections** 6, 6 extends **outwardly** from cosmetic **holder** 3 to be engaged within a continuous spiral groove 5 on the inner surface of outer body 4. Thus, cosmetic **holder** 3 is vertically slideable in the stationary main body 1 in ...rotation of casing 9 and outer body 4. Insert sleeve 7 has an annular external **ridge** 8.
 - Cap 11 includes a resinous inner cap member 12. Inner cap member 12 is secured to...
- ...inner cap member 12 has a thinner portion 15 formed between a pair of spaced swells 16, 17. In this embodiment, each swell 16, 17 is defined by a flat inner surface and an external projection of substantially...
- ...semi-circular cross-section. Below the lower swell 16, inner cap member 12 has a **knurling** inside surface 18.
 - When cap 11 is placed onto sleeve 7, annular external ridge 8 is first positioned in contact with knurling inside surface 18 of inner cap 12, as best seen in Fig. 1B. Then, by applying a downward force to cap 11, lower swell 16 climbs over ridge 8, as shown in Fig. 2B. In this state, ridge 8 rests at the thinner portion 15 which is easily deformed to be tightly adhered to ridge 8, thereby providing an improved air-tight property to container 10. Accordingly, container 10 is
- ...cosmetic material which is prevented from deterioration during a longer period of time. The upper swell 17 is less deformable and therefore acts as a stopper for preventing excessive insertion of sleeve 7. The lower swell 16 acts as another stopper for preventing unintended removal of cap 12. Since the thinner portion 15 is simply formed...
- ...if there is some displacement in engagement between cap 11 and inner cap member 12, **ridge** 8 is surely positioned inside of portion 15 in the capped condition as shown in...
- ...as far as it provides the thinner wall portion 15 formed between lower and upper swells 16, 17. For example, as shown in Figs. 3A and 3B, the inside wall of inner cap member 12 may be somewhat thickened at a portion 19 above the upper swell 17 for contact with the upper end of sleeve 7 when cap 11 is tightly capped (Fig. 3B) thereinto. This provides...
- ...has a thinner wall thickness for easier capping operation.

 Sleeve 7 may have plural annular ridges 8a, 8b as shown in Figs. 4A and 4B. In this modification, the lower ridge 8a is engaged with the deformable portion 15 of inner cap member 12, whereas the upper ridge 8b is positioned above the upper swell 17 in the capped condition (Fig. 4B). In other words, the lower swell 16, the lower ridge 8a, the upper swell 17 and the upper ridge 8b are arranged in a zigzag alignment which provides most preferable air-tightness of container 10.

The cosmetic container of the present invention is generally cylindrical but its shape, size and material is not limitative. The cosmetic container of the present invention is particularly used as a

lipstick container but may be used for receiving any cosmetic material that is volatile or not.

...SPECIFICATION Another object of the present invention is to provide a novel construction of a cosmetic **container** having an improved air-tightness in a capped condition.

According to an aspect of the present invention there is provided a cosmetic container comprising a housing assembly with an annular projection and a cap assembly with an inner cap member engageable with the annular projection, characterized in that the inner cap member has a thin wall portion defined between a pair of upper and lower annular external swells, the thin wall portion being deformed by the annular projection to provide air-tight engagement with the annular projection when the housing assembly is capped with the cap assembly, the lower swell acting as a first stopper against removal of the cap assembly from the housing assembly whereas the upper swell acting as a second stopper against excessive insertion of the housing assembly into the cap assembly.

In a preferable embodiment, the swells of the inner cap member has rectangular cross-section.

In another preferable embodiment, the inner cap member has a portion, above the upper <code>swell</code> , that is inwardly thickened for engagement with an upper end portion of a sleeve member having the annular <code>projection</code> .

In still another preferable embodiment, the annular **projection** of the housing assembly comprises a pair of spaced upper and lower annular **projections** .

In still another preferable embodiment, the inner cap member has a portion, below the lower <code>swell</code>, having a <code>knurling</code> inside wall. In still another preferred embodiment, the inner cap member has a portion, below the lower <code>swell</code>, having a thinner wall thickness.

BRIEF DESCRIPTION OF THE DRAWINGS Other objects and advantages of...

- ...when read in conjunction with the accompanying drawings in which:

 Fig. 1A shows a lipstick container embodying the present invention in an incompletely capped condition, a first half of which is...
- ...is an enlarged view showing "A" part in Fig. 1A;
 Fig. 2A shows a lipstick container embodying the present invention in a completely capped condition, a first half of which is...
- ...same reference numbers throughout the drawings.

 Figs. 1A, 1B, 2A and 2B illustrate a cosmetic **container** embodying the present invention, in which it is in an incompletely capped condition in Figs...
- ...and 1B whereas in a completely capped condition in Figs. 2A and 2B. The cosmetic container 10 comprises, in general, a stationary tubular main body 1, a cosmetic holder 3 that is received in main body 1 and, in turn, accommodates a stick-like elongated slots 2, through which a pair of opposed projections 6, 6 extends outwardly from cosmetic holder 3 to be engaged within a continuous spiral groove 5 on the inner surface of outer body 4. Thus, cosmetic holder 3 is vertically slideable in the stationary main body 1 in response to rotation of casing 9 and outer body 4. Insert sleeve 7 has an annular external ridge 8.
 - Cap 11 includes a resinous inner cap member 12. Inner cap member 12
 is secured to...
- ...inner cap member 12 has a thinner portion 15 formed between a pair of

spaced swells 16, 17. In this embodiment, each swell 16, 17 is defined by a flat inner surface and an external projection of substantially...

...semi-circular cross-section. Below the lower swell 16, inner cap member 12 has a knurling inside surface 18.

When cap 11 is placed onto sleeve 7, annular external ridge 8 is first positioned in contact with knurling inside surface 18 of inner cap 12, as best seen in Fig. 1B. Then, by applying a downward force to cap 11, lower swell 16 climbs over ridge 8, as shown in Fig. 2B. In this state, ridge 8 rests at the thinner portion 15 which is easily deformed to be tightly adhered to ridge 8, thereby providing an improved air-tight property to container 10. Accordingly, container 10 is ...

- ...cosmetic material which is prevented from deterioration during a longer period of time. The upper swell 17 is less deformable and therefore acts as a stopper for preventing excessive insertion of sleeve 7. The lower swell 16 acts as another stopper for preventing unintended removal of cap 12. Since the thinner portion 15 is simply formed...
- ...if there is some displacement in engagement between cap 11 and inner cap member 12, **ridge** 8 is surely positioned inside of portion 15 in the capped condition as shown in...
- ...as far as it provides the thinner wall portion 15 formed between lower and upper swells 16, 17. For example, as shown in Figs. 3A and 3B, the inside wall of inner cap member 12 may be somewhat thickened at a portion 19 above the upper swell 17 for contact with the upper end of sleeve 7 when cap 11 is tightly capped (Fig. 3B) thereinto. This provides...
- ...has a thinner wall thickness for easier capping operation.

 Sleeve 7 may have plural annular ridges 8a, 8b as shown in Figs. 4A and 4B. In this modification, the lower ridge 8a is engaged with the deformable portion 15 of inner cap member 12, whereas the upper ridge 8b is positioned above the upper swell 17 in the capped condition (Fig. 4B). In other words, the lower swell 16, the lower ridge 8a, the upper swell 17 and the upper ridge 8b are arranged in a zigzag alignment which provides most preferable air-tightness of container 10.

 The cosmetic container of the present invention is generally cylindrical but its shape, size and material is not limitative. The cosmetic container of the present invention is particularly used as a lipstick container but may be used for receiving any cosmetic material that is volatile or not.
- CLAIMS 1. A cosmetic container (10) comprising a housing assembly (1, 3, 4, 7, 9) with an annular projection (8) and a cap assembly (11) with an inner cap member (12) engageable with the annular projection (8),

characterized in that the inner cap member (12) has a thin wall portion (15) defined between a pair of upper and lower annular external swells (16, 17), the thin wall portion (15) being deformed to provide air-tight engagement with the annular projection (8) when the housing assembly (1, 3, 4, 7, 9) is capped with the cap assembly (11), the lower swell (16) acting as a first stopper against removal of the cap assembly (11) from the housing assembly (1, 3, 4, 7, 9) whereas the upper swell (17) acting as a second stopper against excessive insertion of the housing assembly (1, 3, 4, 7, 9) into the cap assembly (11).

2. The container according to claim 1,

wherein the **swells** (16, 17) of the inner **cap** member (12) have a rectangular cross-section.

3. The container according to claim 1 or 2,

wherein the inner cap member (12) has a portion (19), above the upper **swell** (17), that is inwardly thickened for engagement with an upper end portion of a sleeve member (7) having the annular **projection** (8).

4. The container according to any of claims 1 to 3,

wherein the annular **projection** (8a, 8b) of the housing assembly (1, 3, 4, 7, 9) comprises a pair of spaced upper (8b) and lower annular **projections** (8a).

5. The container according to any of claims 1 to 4,

wherein the inner cap member (12) has a portion, below the lower swell (16), having a knurling inside wall (18).

- 6. The container according to any of claims 1 to 5, wherein the inner cap member (12) has a portion (20), below the lower swell (16), having a thinner wall thickness.
- ...CLAIMS tandis que le renflement superieur (17) joue le role de deuxieme butee pour empecher l'insertion excessive de l'ensemble de boitier (1, 3, 4, 7, 9) dans l'ensemble de capuchon...

(Item 35 from file: 348) DIALOG(R) File 348: EUROPEAN PATENTS (c) 2004 European Patent Office. All rts. reserv. 01058693 Improved cover for a lip stick Verbesserter Deckel fur einen Lippenstift Couvercle perfectionne pour tubes de rouge a levres PATENT ASSIGNEE: Techpack Espana S.L., (2254300), Potosi, 23, 08030 Barcelona, (ES), (Applicant designated States: all) INVENTOR: Monin-Bareil, Richard, Avda.Pl del Vinyet no.9 Bloque C, 3C, 08190 San Cugat Del Valles, Barcelona, (ES) LEGAL REPRESENTATIVE: Pigasse, Daniel et al (80001), Pechiney, Immeuble "SIS" 217, cours Lafayette, 69451 Lyon Cedex 06, (FR) PATENT (CC, No, Kind, Date): / EP 933040 /A2 990804 (Basic) = (05)6217243EP 933040 A3 020612 APPLICATION (CC, No, Date): EP 99420027 990201; PRIORITY (CC, No, Date): ES 98286 980203 DESIGNATED STATES: AT; BE; CH; CY; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE EXTENDED DESIGNATED STATES: AL; LT; LV; MK; RO; SI INTERNATIONAL PATENT CLASS: A45D-040/00 sei hart abstract X. CLAIMS IN CLAIMS IN ABSTRACT WORD COUNT: 105 NOTE: Figure number on first page: 2 LANGUAGE (Publication, Procedural, Application): French; French; French FULLTEXT AVAILABILITY: Available Text Language Update Word Count CLAIMS A 9931 (French) 748 SPEC A (French) 9931 2010 Total word count - document A 2758 Total word count - document B 0Total word count - documents A + B 2758 Couvercle perfectionne pour tubes de rouge a levres INTERNATIONAL PATENT CLASS: A45D-040/00 SPECIFICATION DOMAINE TECHNIQUE

La presente invention concerne le domaine des $\ensuremath{\mathsf{tu}}$ bes de $\ensuremath{\mathsf{rouge}}$ a levres.

ETAT DE LA TECHNIQUE

Comme cela est connu, les **tubes** de **rouge** a levres sont habituellement composes d'un corps de base, support du crayon ou baton...

...parachevant esthetiquement le tube dans son ensemble.

PROBLEME POSE

Il y a un besoin de **tubes** de **rouge** a levres, concus et structures de maniere a realiser une fermeture absolument etanche du couvercle...

- ...qui, en plus d'etre difficile a realiser dans la pratique, obligerait a exercer une **force excessive** lors des operations d'extraction et de remise en place dudit couvercle, qui a leur...
- ...tube un produit peu pratique a utiliser.

DESCRIPTION DE L'INVENTION

Selon l'invention, le **tube** de **rouge** a levre (20) comprend un couvercle (5) a accoupler par pression a un col (4...

...col (4) ou audit couvercle (5), pour realiser une fermeture etanche dudit tube (20).

Les **tubes** de **rouge** a levres proposes par l'invention constituent un perfectionnement resolvant le probleme precedemment expose, en... ...desaccouplement durant cette duree.

DESCRIPTION DES DESSINS

La figure 1 represente, selon en vue en **projection** laterale et en coupe diametrale, un **tube** de **rouge** a levres dont le couvercle est realise conformement aux perfectionnements objets de la presente invention...d' un fond (3) et contenant le mecanisme de support (2) et de deplacement du **tube** de **rouge** a levres (non represente sur les figures), presentaient le meme diametre interieur, de maniere a...

- ...part elle resout d'une maniere simple et efficace le probleme de l'etancheite des tubes de rouge a levres,
 - d'autre part, elle divulgue un concept ouvert sur un grand nombre de...
- CLAIMS 1. **Tube** de **rouge** a levre (20) comprenant un couvercle (5) a accoupler par pression a un col (4...

37/3,K/37 (Item 37 from file: 348)

DIALOG(R) File 348: EUROPEAN PATENTS

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01020919

GASTIGHT MAKEUP MATERIAL CONTAINER

GASDICHTER BEHALTER FUR SCHMINKPRODUKTE

BOITIER ETANCHE AUX GAZ POUR SUBSTANCE DE MAQUILLAGE

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APPLICATION (CC, No, Date): EP 97929514 970703; WO 97JP2312 970703

DESIGNATED STATES: FR

INTERNATIONAL PATENT CLASS: A45D-033/00

ABSTRACT WORD COUNT: 325

NOTE:

Figure number on first page: 1

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Available Text Language Update Word Count CLAIMS A (English) 9938 1226 SPEC A (English) 9938 10405 Total word count - document A 11631 Total word count - document B Ω Total word count - documents A + B 11631

INTERNATIONAL PATENT CLASS: A45D-033/00

...SPECIFICATION is fixed in position by engagement of these first and second engaging portions.

The cosmetic **container** with the inner tray shown in vi) Japanese Laid-open Patent Publication No. 9-47319...inner tray is pressed toward the first engaging tooth by a convexity on the holding **wall**.

The hermetically sealed cosmetic container with the inner lid shown in vii) Japanese Laid-open Patent Publication No. 8-348 has an opening member...

- ...on either one of the openable and closable end of the inner lid or the container housing. The cosmetic container with the inner lid disclosed in viii) Japanese Laid-open Patent Publication No. 9-98828 has a single push...
- ...releasing member for releasing a first hook with which the outer lid detachably engages the **container housing**, and a second releasing member for releasing a second hook with which the inner lid detachably engages the **container housing**. The first and second hooks can respectively be released with a single sliding action of the push-piece. However, with the conventional hermetically sealed **cosmetic containers** disclosed in i) Japanese Laid-open Patent Publication No. 9-37839 and iii) Japanese Laid...

- ...and hence, reducing the amount of the cosmetic material accommodated therein. With the hermetically sealed **cosmetic container** disclosed in ii) Japanese Laid-open Patent Publication No. 8-347, the elastic gaskets are...
- ...inner tray and the lid, and are separately formed from the inner tray and the lid. Consequently, the disclosed container is made up of an increased number of parts which further complicates the structure, and cannot efficiently be assembled.

The inner lid of the cosmetic container revealed in iv) Japanese Laid-open Patent Publication No. 9-65920 can easily be opened...

- ...and closed by respective separate actions, the process of opening the lids is complex. The **cosmetic container** disclosed in v) Japanese Laid-open Patent Publication No. 9-98829 has the partition wall...
- ...first engaging portions are disposed on the partition wall, the structure is further complex. The **cosmetic container** shown in vi) Japanese Laid-open Patent Publication No. 9-47319 has the partition wall ...
- ...are disposed on the slitted claws, the structure is further complex.
 With the hermetically sealed **cosmetic container** shown in vii)
 Japanese Laid-open Patent Publication No. 8-348, the opening member for
 ...
- ...outer lid and the inner lid separately makes it inefficient to open the lids. The **cosmetic container** revealed in viii) Japanese Laid-open Patent Publication No. 9-98828 can easily be operated...
- ...piece, resulting in various problems such as a corresponding increase in the size of the **cosmetic container** and reduction in the amount of the cosmetic material that can be accommodated therein.

DISCLOSURE...

- ...conventional problems, it is an object of the present invention to provide a hermetically sealed **cosmetic container** having a region, simplified in structure, for accommodating a refill case in a container housing. Another object of the present invention is to provide a hermetically sealed **cosmetic container** which is capable of increasing the amount of cosmetic material to be accommodated therein without increasing the size of the **cosmetic container**, and reducing the space required to operate lids of a double structure while improving the...
- ...the above object, there is provided in accordance with the present invention a hermetically sealed **cosmetic** container comprising:

 a **container** housing having a bottom wall and an outer peripheral wall surrounding the bottom wall, the...
- ...the bottom wall defining an accommodating space therein; an outer lid rotatably mounted on the container housing for opening and closing the accommodating space;
 - a refill case having an inner tray defining...with the hinge mechanism being disposed adjacent to the outer peripheral wall of the container housing, and the inner lid having an openable and closable end positioned on the opposite side of the hinge mechanism...
- ...side of the accommodating space to the other;
 the hermetic sealing mechanism comprising:
 an annular ridge disposed on either one of the inner tray or the

inner lid in surrounding relationship...

...the inner lid and having a slanted surface movable in frictional contact with the annular **ridge** while the inner **lid** is being closed, the hermetically sealing ring being hermetically pressable against the entire periphery of the annular **ridge**.

A hermetically sealed **cosmetic** container further comprises a lid opening mechanism including:

- a first engaging tooth disposed on the container housing;
- a first hook...
- ...second engaging tooth, under the operating forces imparted to the operating member.

A hermetically sealed **cosmetic container** further comprises a lock mechanism disposed between the inner tray of the refill case and...

- ...side of the accommodating space against sliding movement.

 Further, there is provided a hermetically sealed **cosmetic container** wherein the pair of slide guides and the pair of slides are vertically disengageably engageable...
- ...the accommodating space in the container housing in the vertical directions.

Furthermore, a hermetically sealed **cosmetic container** according to the present invention comprises:

- a container housing having a bottom wall and an...
- ...the bottom wall defining an accommodating space therein; an outer lid rotatably mounted on the container housing for opening and closing the accommodating space; a refill case having an inner tray defining...
- ...with the hinge mechanism being disposed adjacent to the outer peripheral wall of the container **housing**, and the inner **lid** having an openable and closable end positioned on the opposite side of the hinge mechanism ...the operating forces imparted to the operating member; the hermetic sealing mechanism comprising:

an annular ridge disposed on either one of the inner tray or the inner lid in surrounding relationship...

...the inner lid and having a slanted surface movable in frictional contact with the annular **ridge** while the inner **lid** is being closed, the hermetically sealing ring being hermetically pressable against the entire periphery of the annular **ridge**.

With the above arrangement according to the present invention, the refill **case** which accommodates **cosmetic** material is installed in one side of the accommodating space opposite to the other side...

...the hinge mechanism, in a manner so that it is exposed out of the container housing. Therefore, when the inner lid is rotated, the hinge mechanism does not interfere with the container housing, and can be opened widely and outwardly of the container housing.

When the inner lid is closed to close the cosmetic accommodating region of the inner tray, the cosmetic accommodating...

- ...closed, the hermetically sealing ring is hermetically pressed against the full periphery of the annular **ridge**. The annular **ridge** is disposed on either one of the inner tray or the inner lid so as...
- ...the same time, the hermetically sealing ring is frictionally contacting

and sliding against the annular ${\bf ridge}$. Therefore, even if there are cosmetic-material-deposits on the annular ${\bf ridge}$ and the hermetically sealing ${\bf ring}$, those cosmetic-material-deposits can be scraped off by the sliding movement of the annular ${\bf ridge}$ and the hermetically sealing ${\bf ring}$.

The surface of the hermetically sealing ring against which the annular ridge slides is the slanted surface. Consequently, as the inner lid is closed, the annular ridge slides to press progressively and more strongly against the slanted surface of the hermetically sealing...

...deposits. When the inner lid is fully closed, the hermetically sealing ring and the annular **ridge** are pressed against each other under increased pressing forces.

According to the present invention, when ... vertically.

BRIEF DESCRIPTION OF DRAWINGS

FIG. 1 is a perspective view of a hermetically sealed **cosmetic container** according to an embodiment of the present invention, the view showing a container **housing** with an outer **lid** being open and a refill **case** removed from the container housing;

FIG. 2 is a plan view of the hermetically sealed cosmetic container shown in FIG. 1 with the outer lid open;

FIG. 3 is a fragmentary perspective...

...of the container housing, from which a push-piece is detached, of the hermetically sealed **cosmetic container** shown in FIG. 1;

FIG. 4 is a cross-sectional view taken along line IV - IV of FIG. 1, illustrating the hermetically sealed **cosmetic container** shown in FIG. 1 with the refill case attached thereto;

FIG. 5 is a cross-sectional view taken along line V - V of FIG. 1, illustrating the hermetically sealed **cosmetic container** shown in FIG. 1 with the refill case attached thereto;

FIG. 6 is a cross-sectional view taken along line VI - VI of FIG. 1, illustrating the hermetically sealed **cosmetic container** shown in FIG. 1 with the outer and inner lids closed,

FIG. 7 is a cross-sectional view similar to FIG. 6, illustrating the hermetically sealed **cosmetic container** shown in FIG. 1 with the outer and inner lids being about to be opened...

...enlarged cross-sectional view of portion VII shown in FIG. 5, of the hermetically sealed **cosmetic container** shown in FIG. 1;

FIGS. 9 through 18 are enlarged cross-sectional views similar to FIG. 8, showing other hermetical sealing mechanisms that are applicable to the hermetically sealed **cosmetic container** according to the present invention.

BEST MODE FOR CARRYING OUT THE INVENTION Embodiments of the...

- ...reference to the accompanying drawings. As shown in FIGS. 1 and 2, a hermetically sealed **cosmetic container** 10 according to the present embodiment has a container **housing** 12 and an outer **lid** 16 hinged to a rear end of the container housing 12 by a first hinge...
- ...to a first engaging tooth 24 mounted centrally on a front end of the container **housing** 12. The outer **lid** 16 remains closed by this engagement. The first engaging tooth 24 is disposed in a...
- \dots 26 is mounted in a recess 16a defined in the reverse side of the outer

lid 16.

The refill case 20 is used as a replacement case which accommodates cosmetic material therein. The refill case 20 comprises an inner tray 28 having a cosmetic accommodating...ring 38 disposed around the opening of the cosmetic accommodating region 28a and an annular ridge 40 on the inner lid 30 which extends along the hermetically sealing ring 38.

The hermetically sealing ring 38 is...

- ...of the cosmetic accommodating region 28a, and has an upper portion projecting as an upward **protrusion** 38a from the **upper** end of the opening of the cosmetic accommodating region 28a. The hermetically sealing ring 38...
- ...an annular groove 38b defined peripherally in the inner peripheral surface thereof immediately below the **protrusion** 38a. The **annular** groove 38b serves to reduce the thickness of the hermetically sealing ring 38 to impart...
- ...ring 38 further has an annular inner flange 38c projecting radially inwardly from the aforesaid **protrusion** 38a and slidably supported on an inner flat surface 28f around the cosmetic accommodating region...
- ...also has a first slanted surface 42 disposed on an outer periphery of the aforesaid **protrusion** 38a and inclined **outwardly** of the inner tray 28 with its outer diameter progressively increasing along the downward direction...
- ...has a peripheral edge with a step-like projecting portion which serves as the annular ridge 40. The annular ridge 40 has a second slanted surface 44 which confronts the first slanted surface 42 of the protrusion 38a from the above side and which is inclined at an angle (theta) 2 that...
- ...the first slanted surface 42, when the inner lid 30 starts to close, the annular ridge 40 is first brought into contact with the protrusion 38a. Thereafter, when the inner lid 30 is further closed, the inner peripheral corner of the annular ridge 40 moves while scrubbing against the first slanted surface 42 of the hermetically sealing ring...
- ...extend parallel to each other have respective slide guides 46 comprised of a pair of ridges and extending parallel to the bottom wall 12b of the accommodating space 18. The side surfaces 28c, 28d of the inner...50d has a length up to a position immediately below the edge of the inner lid 30 of the refill case 20 by passing through a recess 12e defined in an upper portion of the cavity...
- ...second releasing member 50d is positioned below the inner lid 30. In the hermetically sealed **cosmetic container** 10 with the above-mentioned structure according to this embodiment, when the outer lid 16...
- ...the lids when using the cosmetic material is highly simplified even though the hermetically sealed **cosmetic container** 10 has a detachable refill **case** 20. Though both the outer **lid** 16 and the inner lid 30 can be opened by a single action of the...
- ...the space required for the push-piece 50 may be small, and the hermetically sealed **cosmetic container** 10 may be reduced in size. When the inner **lid** 30 of the refill **case** 20 is opened, the second hinge 32 does not interfere with the outer peripheral wall...

- ...remains highly hermetically sealed by the hermetically sealing ring 38. Specifically, as for the refill case 20, as the inner lid 30 is progressively closed, the inner corner of the annular ridge 40 formed on the inner lid 30 abuts against the first slanted surface 42 outward of the protrusion 38a of the hermetically sealing ring 38 on the inner tray 28. As the inner lid 30 is further closed, the annular ridge 40 frictionally moves downwardly while frictionally contacting and sliding against the first slanted surface 42...
- ...38 provided around the opening of the cosmetic material accommodating region 28a and the annular ridge 40 of the inner lid 30, those cosmetic-material-deposits are scraped off the hermetically sealing ring 38 and the annular ridge 40 by the sliding engagement of the annular ridge 40 and the hermetically sealing ring 38 before the inner lid 30 is fully closed. Accordingly, both engaging surfaces are kept...
- ...Because the first slanted surface 42 of the hermetically sealing ring 38 slides against the **annular ridge** 40, as the inner **lid** 30 is progressively closed, the annular **ridge** 40 slides progressively and more strongly against the **protrusion** 38a, thus effectively scraping off cosmetic-material-deposits. When the inner lid 30 is completely...
- ...region 28a is highly hermetically sealed because the first slanted surface 42 and the annular **ridge** 40 are pressed against each other under sufficient pressing forces and also because cosmetic-material time.

In the hermetic sealing mechanism according to this embodiment, the **protrusion** 38a, which performs a substantial sealing function of the hermetically sealing ring 38, project's...

- ...region 28a. Therefore, the position above the cosmetic accommodating region 28a is sealed by the **protrusion** 38a. Unlike the conventional structure in which the cosmetic accommodating region 28a is sealed in...
- ...the amount of the accommodated cosmetic material without increasing the size of the hermetically sealed **cosmetic container** 10. The hermetically sealing ring 38 fitted in the annular groove 28e is radially and...
- ...sealing ring 38 which would otherwise tend to fall by forced contact with the annular ridge 40 is borne by the inner flat surface 28f. As a result, the necessary elastic deformability is appropriately imparted to the sealing member while assuring that the annular ridge 40 is capable of removing cosmetic-material-deposits with the above-described sliding movement.

In...

- ...18, there is no partition wall present between the installing space 18a for the refill case 20 and the make- up instrument accommodating space 18b, unlike the conventional arrangements. Therefore, the accommodating space 18 is moldable...
- ...slide the refill case 20 in the accommodating space 18. In addition, the amount of **projection** of the slide guides 46 and the depth of the slides 48 may be adjusted...
- ...a hermetically sealing ring 38 is disposed on an inner tray 28 and an annular **ridge** 40 disposed on an inner **lid** 30 is pressed against the outer periphery of a **protrusion** 38a of the hermetically sealing **ring** 38, as is the case with the above embodiment. FIGS. 12 through 15 show

types in which an annular ridge 40 disposed on an inner lid 30 is pressed against the inner periphery of a protrusion 38a of a hermetically sealing ring 38 disposed on an inner tray 28. FIGS. 16 through 18 show types in which a hermetically sealing ring 38 is disposed on an inner lid 30 and an annular ridge 40 is disposed on an inner tray 28.

More specifically, in a hermetic sealing mechanism...

- ...in FIG. 9, the angle .2 of a second slanted surface 44 of the annular ridge 40 disposed on the inner lid 30 is smaller than the angle (theta)1 of a first slanted surface 42 of the protrusion 38a of the hermetically sealing ring 38. This embodiment offers the same operation and advantages as those of the above embodiment...
- ...hermetic sealing mechanism according to an embodiment shown in FIG. 10, an upwardly projecting annular ridge 56 is integrally formed with the upper end of the inner tray 28 in spaced relationship to the outer periphery of the hermetically sealing ring 38. The annular ridge 56 separates the inner and outer regions of the cosmetic accommodating region 28a from each other. An upper surface of the inner tray 28 which is outside the annular ridge 56 is higher than an inner flat surface 28f.

This embodiment offers the same operation...

...also capable of holding scraped cosmetic-material-deposits in a clearance 58 between the annular **ridge** 56 and the hermetically sealing **ring** 38 for preventing scattering.

In a hermetic sealing mechanism according to an embodiment shown in FIG. 11, an annular **ridge** 56 is disposed on a **ring** 60 separate from the inner tray 28, and the ring 60 is fitted around the...

- ...28, and the first slanted surface 42 is disposed on the inner side of the **protrusion** 38a of the hermetically sealing **ring** 38. The inner lid 30 has an annular **ridge** 40 at a position corresponding to the inner periphery of the hermetically sealing ring 38, and a second slanted surface 44 is disposed on the outer side of the annular **ridge** 40. The angle (theta)1 of the first slanted surface 42 is greater than the...
- ...64 having a height which is substantially the same as the upper end of the **protrusion** 38a of the hermetically sealing **ring** 38 is disposed on the outer peripheral edge of the annular groove 28e for preventing the **protrusion** 38a from falling **outwardly**. The inner lid 30 has a sealing tooth 66 confronting the upper end of the **protrusion** 38a. When the inner **lid** 30 is closed, the sealing tooth 66 is pressed against the upper end of the **protrusion** 38a.

According to this embodiment, alike the above-mentioned embodiments, when the inner lid 30 is closed, the second slanted surface 44 of the annular **ridge** 40 slides against the first slanted surface 42 of the hermetically sealing ring 38 for...

- ...44 for an increased sealing capability. Since the sealing tooth 66 is pressed against the **protrusion** 38a of the hermetic sealing **ring** 38 when the inner lid 30 is closed, the pressed surfaces also provide a seal ...
- ...FIG. 13, the angle (theta)2 of the second slanted surface 44 of the annular ridge 40 is substantially at right angle so as to be greater than the first slanted surface 42 of the protrusion 38a of the hermetically sealing ring 38. This embodiment offers the same operation and advantages as those of the above embodiment...
- ... In a hermetic sealing mechanism according to an embodiment shown in FIG.

- 16, the annular ridge 40 projects upwardly and integrally from the inner tray 28 around the cosmetic accommodating region corresponding to the annular ridge 40, with a hermetically sealing ring 38 fitted in the annular groove 72. The hermetically sealing ring 38 has a protrusion 38a on its lower end which has a first slanted surface 42 on its outer periphery. The annular ridge 40 has a second slanted surface 44 on its inner periphery in confronting relation to...
- ...44. The upper surface of the inner tray 28 which is outside of the annular **ridge** 40 is formed at a higher level than the inner flat surface 28f inside of the annular **ridge** 40. There is provided a hanging wall 74 projecting on the inner peripheral edge of...
- ...72 to a position which is substantially the same as the lower end of the protrusion 38a of the hermetically sealing ring 38. The hanging wall 74 serves to prevent the protrusion 38a from falling over.

 In this embodiment, when the inner lid 30 starts being closed, the lower end of the first slanted surface 42 formed in the protrusion 38a of the hermetically sealing ring 38 on the side of the inner lid 30 abuts against the upper end of the second slanted surface 44 of the annular ridge 40 on the inner tray 28. When the inner line 30 is further closed, the...
- ...the second slanted surface 44. Even if there are cosmetic-material-deposits on the annular **ridge** 40 around the opening of the cosmetic accommodating region 28a and the hermetically sealing ring...
- ...material-deposits are scraped off from between the hermetically sealing ring 38 and the annular ridge 40 by the sliding engagement between the annular ridge 40 and the hermetically sealing ring 38 before the inner lid 30 is fully closed. Accordingly, both portions can be kept...
- ...FIG. 17, the angle (theta)2 of the second slanted surface 44 of the annular ridge 40 projecting from the inner tray 28 is substantially at right angle so as to be greater than that of the first slanted surface 42 of the protrusion 38a of the hermetically sealing ring 38. This embodiment offers the same operation and advantages as those of the above embodiment...
- ...is capable of increasing the hermetic sealability of a cosmetic accommodating region 28a. When the **protrusion** 38a is pressed against the annular 1ridge 40, the inner **peripheral edge** of the hermetically sealing ring 38 which is pushed inwardly is slidably borne by a recess 76 defined in the lower end of the hanging wall 74. Consequently, the necessary **elastic deformability** is appropriately imparted to the sealing member while assuring that the annular **ridge** 40 is capable of removing cosmetic-material-deposits with its sliding movement.

 There have been...
- ...case 20, the hermetic sealing mechanism comprising the hermetically sealing ring 38 and the annular **ridge** 40, and the rotatable push-piece 50. The above embodiments are merely given by way...
- ...be of other structures than those disclosed in the above embodiments. In the hermetically sealed **cosmetic containers** according to the present invention, as described above, the refill **case** which accommodates **cosmetic** material is installed in one side of the accommodating space formed in the container housing...housing adjacent to the hinge mechanism to expose the hinge mechanism out of the container

housing. Therefore, when the inner lid is rotated, the hinge mechanism does not interfere with the outer peripheral wall of the container housing, and can be opened widely outwardly of the container housing.

When the inner lid is closed to close the cosmetic accommodating region of the inner tray, the cosmetic accommodating...

.closed, the hermetically sealing ring is hermetically pressed against

...closed, the hermetically sealing ring is hermetically pressed against the full periphery of the annular ridge, which is disposed on either one of the inner tray or the inner lid in...

- ...the same time the hermetically sealing ring is frictionally contacting and sliding against the annular ridge. Therefore, even if there are cosmetic-material-deposits on the annular ridge and the hermetically sealing ring, those cosmetic-material-deposits can be scraped off by the sliding movement of the annular ridge and the hermetically sealing ring. Therefore, when the inner lid is completely closed, the clean annular ridge is pressed against the hermetically sealing ring which is clean and free of cosmetic-material...
- ...excellent hermetically sealing capability.

 The surface of the hermetically sealing ring against which the annular ridge slides is formed into a slanted surface. Consequently, as the inner lid is progressively closed, the annular ridge slides progressively and more strongly against the slanted surface of the hermetically sealing ring for...
- ...lid is fully closed, the pressing force between the hermetically sealing ring and the annular ridge is increased for a better hermetically sealing capability.

 Because the hermetic sealing mechanism is disposed...
- ...larger, increasing the amount of the accommodated cosmetic material without increasing the size of the **cosmetic container**.

 According to the present invention, furthermore, when the single operating member of the push-piece...
- ...push-piece to operate may be small, resulting in reduction in the size of the **cosmetic container**.

 According to the present invention, furthermore, the lock mechanism is disposed between the inner tray...

37/3,K/39 (Item 39 from file: 348)

DIALOG(R) File 348: EUROPEAN PATENTS

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00970272

An outer shell for a cosmetic container for preventing accidental removal of the shell's cover

Verschlusskappe fur einen Kosmetikbehalter, die ihre versehentliche Entfernung verhindert

Capuchon d'un etui cosmetique evitant un enlevement accidentel PATENT ASSIGNEE:

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An outer shell for a cosmetic container for preventing accidental removal of the shell's cover

INTERNATIONAL PATENT CLASS: A45D-040/02

...ABSTRACT A1

A protective outer shell (12) for a **cosmetic container** (10), such as a **lipstick container**, having a tubular shell **cover** (14) and a tubular shell base (16) wherein the shell cover is positively retained on the shell base. The shell cover includes at least one radially inwardly extending **rib** (46) extending along an inner surface of the **cover**. The **rib** cooperates with a locking member (26-34) extending radially outward from the shell base so...

SPECIFICATION Field of the Invention

The present invention is directed to a **cosmetic container** having a protective outer shell including a shell base and shell cover which is positively retained upon the shell base to prevent accidental removal therefrom.

Background of the Invention

Cosmetic containers , by nature, must be readily portable so as to be carried by the consumer. For instance, **cosmetic** containers are frequently carried in a purse or packed within a suitcase for travel. The containers...

- ...closed so as to withstand significant shifting and possible impact. This is particularly true for lipstick containers which are relatively small, frequently haphazardly placed, and often subjected to significant jarring. If the cover of the cosmetic container is easily dislodged from the shell base, it may be unintentionally released, causing the lipstick...
- ...cosmetic contained therein to become damaged; not to mention damage to the purse or other case holding the cosmetic container. It is, therefore, important for the cosmetic container cover to be securely retained upon the shell base to prevent axial movement of the cover relative to the shell base to avoid accidental removal of the cover during transport of the container.

Another problem associated with cosmetic containers, including lipstick containers, is that even if the cover of the container remains intact with the shell base, the cosmetic contained therein may be unintentionally extended from...

- ...rotational movement between the shell base and the cover to protect the integrity of the **cosmetic** within the **container**.

 Prior art attempts to provide containers having locking arrangements for mating the cover and shell...
- ...For example, U.S. Patent No. 5,160,057 to Fitjer is directed to a cosmetic container, such as for mascara, wherein a locking arrangement is provided to prevent further rotational movement of the threaded closure cap relative to the base. The cosmetic container includes a base element having a square cross-section and a threaded neck and a...
- ...shoulders and two stop returns mounted on the base element and two stop and catch **protrusions** extending inwardly from the interior surface of the closure cap. Accordingly, in use, the screw closure cap is threaded upon the **cosmetic container** base element wherein the stop catch **protrusion** rides over the return stop until abutting the stop shoulder to prevent further rotational movement...
- ...two different locking arrangements are required to prevent both rotational and axial movement of the **container cover** relative to the body portion. Axial movement is limited by the locking arrangement including a...
- ...extending radially outwardly from the body portion and an inwardly extending locking lug of the container cover. Rotational movement is limited by an inwardly extending protrusion of the cover which mates with recesses of the locking lugs. Thus, a compl.icated structure is disclosed...
- ...of the Present Invention

 It is therefore an object of the present invention provide a **cosmetic**container which prevents accidental removal of the **container** cover.

It is also an object of the present invention to provide **cosmetic** container which may be economically manufactured.

The present invention is directed to a **cosmetic container**, such as a **lipstick container**, having a protective outer shell. The outer shell includes a tubular shell base and a...

...shell base are prevented. The tubular shell cover includes at least one radially inwardly extending **rib** extending along at least a portion of the inner surface. The reduced diameter wall portion...

...a radially outwardly extending locking member including an axial locking ledge to mate with the <code>rib</code> of the shell <code>cover</code> to substantially prevent relative axial movement therebetween in the locked position. The reduced diameter wall portion of the tubular shell base also includes a seat for receiving the <code>rib</code> of the tubular shell. The seat is positioned below the locking ledge and is configured to mate with the <code>rib</code> of the tubular shell <code>cover</code> to limit the relative rotational movement between the tubular shell <code>cover</code> and the tubular shell...

...shell base, it may be rotated in the direction of the locking ramp wherein the <code>rib</code> of the shell <code>cover</code>, which is formed of a resilient material, rides over the locking ramp, thereby seating within the <code>cosmetic container</code>. Axial movement is prevented by the locking ledge which extends circumferentially above the seat in which the <code>rib</code> is received. Accordingly, the shell <code>cover</code> maintains a locked position on the shell base and accidental removal of the shell <code>cover</code> is prevented. The <code>cosmetic container</code> having the locking arrangement for securing the shell cover to the shell base according to...

...locked position. This is due at least in part to the resilient nature of the **rib** and the limiting action provided by the locking ledge, the locking ramp, and the locking abutment.

The cosmetic container having the protective outer shell also includes a lipstick dispensing assembly. The lipstick dispensing assembly may be secured to the shell base which provides an outer protective shell for the dispensing assembly. The dispensing assembly includes a cosmetic carrier, a tubular inner sleeve, and a tubular outer sleeve.

The cosmetic carrier supports the...

...shell base to cause the cosmetic carrier and hence, the lipstick, to extend from the **container** for applying the **lipstick** and to retract into the container for storage.

Brief Description of the Drawings The foregoing...

...invention and from the drawings, in which:

Figure 1 is a perspective view of a **cosmetic container** according to the present invention;

Figure 2 is a cross sectional view of the lipstick dispensing assembly within the protective outer shell;
Figure 3 is a perspective view of the container body...

...cross-sectional view taken along line 5-5 of Figure 3;
Figure 6 is a **top** plan view of the **container** body of Figure 3;
Figure 7 is a cross-sectional view of the annular cover...

...Figure 1 illustrating the locked position; and
Figure 12 is an exploded view of the cosmetic container of Figure
1.

Detailed Description of the Preferred Embodiments The present invention will now be...

...those skilled in the art.

The present invention as shown and described herein is a **container** for applying **cosmetics**, such as lipstick. However, it should be evident that the container has utility in various...
...case. For instance, the container may be utilized for any product

requiring topical application.

The lipstick container of the present invention, indicated generally by the reference character 10, is designed for dispensing lipstick so that it may be cosmetically applied. The lipstick container 10 includes a protective outer shell 12 defined by a tubular shell cover 14 and reduced diameter wall portion 20 defining a flange 22.

- A **cosmetic** dispensing **assembly**, shown generally at 24, is positioned within the protective outer shell 12. The dispensing assembly \dots
- ...shell cover 14 and the shell base 16 forming the outer shell 12 of the cosmetic container 10 will now be described more fully in detail. Preferably, both the shell base 16...
- ...when viewed from above, the sleeve base 16 appears to have a pair of radially **outwardly** extending **protrusions** on diametrically opposing surfaces extending along a circumferential portion thereof due to the position of...
- ...18. Within the increased diameter portion 44 are located a pair of radially inwardly extending ribs 46. As shown, a pair of ribs 46 are provided, but it is within the spirit and scope of the present invention to provide one or any number of ribs. Preferably, the number of ribs 46 corresponds with the number of locking members 26 on the shell base 16. The radially inwardly extending ribs 46 are configured to mate with the locking ledge 28, seat 30, locking abutment 22, and locking ramp 34 of the shell base 16. Preferably, the rib 46 is formed of a resilient material such as plastic, and is formed integral with...
- ...separately from the shell cover 14 and then be secured thereon.

 The cooperation of the **rib** 46 of the shell **cover** 14 and the locking member 26 of the shell base 16 is best illustrated in...
- Accordingly, the rib 46 of the shell cover 14 may be rotated so as to resiliently traverse the length of the inclined surface 36 of the locking ramp 34 and then relaxing within the seat 30. The rib 46 is maintained in position between the locking abutment 32 and the abutting surface 38
- ...locking ledge 28 positioned above the seat 30. Upward axial force applied to the shell **cover** 14 causes the **ribs** 46 to contact the locking ledge 28 which precludes further upward axial movement of the shell **cover** 14. Thus, the **cosmetic container** 10 assumes a locked position both as to relative axial and rotational displacement of the...
- ...the opposite direction (opposite that shown by arrow a in Figure 11) wherein the resilient **rib** 46 ...38 of the locking ramp 34 upon rotational forces of a predetermined amount. When the **rib** 46 is removed from the seat 30, and clear of the locking ramp 34, the...
- ...applying axial force. Accordingly, only upon the application of a predetermined rotational force will the **cosmetic container** assume an unlocked position, and therefore, accidental removal of the shell cover 14 from the shell base 16 is substantially precluded.

The lipstick container 10 includes a plurality of tubular members which are concentrically arranged about the longitudinal axis...

...pair of longitudinal slots 54 which extend parallel to the longitudinal

- axis I of the **cosmetic container** 10. Positioning of the cosmetic carrier 48 within the inner sleeve 52 is enhanced by...
- ...slot (not shown) defined by upper and lower sidewalls.

 The above-described components of the lipstick container 10 permit easy application of the lipstick by permitting the lipstick to be extended from and retracted within the lipstick container 10. The assembly, shown exploded in Figure 2, is maintained in proper alignment and positioning due to the...
- ...are retained between the flange 66 and the base portion 58.

 The operation of the cosmetic container 10 according to the present invention will now be described with reference to the various figures. The cosmetic container extends and retracts the lipstick to prevent extension thereof beyond the upper end of the cosmetic container 10 so that it may be applied. The lipstick is propelled within and from the cosmetic container 10 by removal of the shell cover 14 and by the rotation of the shell...
- ...the shell base 16 in the opposite direction to permit easy application while protecting the **lipstick** within the **cosmetic** container 10 when not in use.

While particular embodiments of the invention have been described, it \dots

- CLAIMS 1. A cosmetic container comprising:
 - at least one tubular sleeve;
 - a cosmetic carrier positioned within said at least one...
- ...cover is positioned on said shell base, and having at least one radially inwardly extending rib extending along at least a portion of said inner surface of said shell cover, said...
- ...radially outwardly extending locking member including an axial locking ledge configured to mate with said **rib** to substantially prevent relative axial movement between said shell cover and said shell base when...
- ...said reduced wall portion, said reduced wall portion further including a seat for receiving said **rib** of said shell **cover** in the locked position for substantially limiting relative rotational movement between said shell cover and said shell base when said shell cover is in the locked portion.
 - 2. A cosmetic container according to Claim 1 wherein said seat is positioned below said locking ledge on said reduced wall portion.
 - 3. A cosmetic container according to Claim 1 wherein said seat is a recess defined by said reduced wall portion.
 - 4. A cosmetic container according to Claim 3 wherein said locking member further includes a locking ramp and a locking abutment positioned axially below said locking ledge adjacent said seat.
 - 5. A cosmetic container according to Claim 4 wherein said locking member further includes a locking abutment positioned axially...
- ...is positioned between said locking ramp and said abutment which define said recess wherein said rib of said shell cover rides over said locking ramp and seats within said seat, such that when said cover...
- ...and said shell base when said shell cover is in the locked position.
 6. A cosmetic container according to Claim 1 wherein said rib of said shell cover is resilient.

- 7. A cosmetic container according to Claim 1 wherein said at least one annular sleeve is an outer sleeve having a helical channel extending along an inner periphery of said outer sleeve.
- 8. A cosmetic container according to Claim 7 wherein said cosmetic carrier includes at least one radially outwardly extending...
- ...carrier is movable longitudinally upwardly or downwardly within said at least one sleeve.
 - 9. A cosmetic container according to Claim 8 further comprising a second, tubular inner sleeve rotatable within said at...
- \ldots slot of said inner sleeve and traversing the length of the helical channel.
 - 10. A cosmetic container according to Claim 9 wherein at least a portion of said inner sleeve extends axially...
- ...manually rotatable base, said cosmetic carrier will be propelled longitudinally upwardly or downwardly.
 - 11. A cosmetic container according to Claim 1 wherein a portion of said at least one inner sleeve is positioned within said shell base.
 - 12. A cosmetic container according to Claim 11 wherein said manually rotatable base is secured to said shell base.

37/3,K/41 (Item 41 from file: 348)

DIALOG(R) File 348: EUROPEAN PATENTS

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00956033

Improved mechanical container for barshaped products Mechanischer Behalter fur stiftformige Produkte Recipient mecanique pour produits en forme de baton PATENT ASSIGNEE:

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| Total word | count - | document | s A + B | 2827 |

INTERNATIONAL PATENT CLASS: A45D-040/06

- ...ABSTRACT invention proposes a mechanical container for products shaped in the form of a bar, the **container** body and/or the closing **cap** incorporating respective nerves which adapt onto one another and secure the cap in the closed...
- ...body or the cap, is fitted with an attachment groove for receiving a nerve or **projection** emerging from the other body.
- ...SPECIFICATION and as a result of a new industrial feature, this invention is related to mechanical **containers** used for **lipstick**, wherein the bar or lipstick moves axially outward from the container when in use or...

...for protection.

The improvements provided by the invention involve the sliding means in the closing cap along the body of the container and its effective and reliable hold between the container body and the closing element.

BACKGROUND...

...object of the invention consists in providing an effective attachment or retaining system between the **container** body and the closing **cap**.

A further object of the proposed container invention consists in providing a means of attachment between the **container** and the closing **cap** which allows for easy and smooth separation of the closing **cap** from the **container** body, when so desired.

A further object of the invention refers to the reinforcing means...

..on.

One characteristic of the invention consists in improving the means of attachment between the **container** and the closing **cap** by fitting both parts with respective nerves, one on the external periphery of the container...

...nerve with an appropriate dimension and section which projects from the inner wall of the ${f container}$'s closing ${f cap}$.

A further characteristic of the invention relates to the nerve protruding from inside the closing...

- ...the container's cylindrical body to provide a smooth, oscillation-free sliding motion between the **container** and the closing **cap**, in addition to easy entry of the nerve in the attachment channel at the lower...
- ...further characteristic of the invention involves the formation of a contact-free gap between the **container** body and the closing **cap**. A further characteristic of the invention provides the closing cap with a means of reinforcement...
- ...closing cap is optionally fitted with a channel or groove which coincides with a pripheric **projection** on the container body that lodges inside said closing cap groove, thereby establishing an attachment... ...solves the problems discussed, which specifically affect the means of sliding and attachment between the **container** body and the closing **cap**

The invention provides an improvement in that the container for bar-shaped products, preferably lipstick, has an external tubular body with inner helicoidal channels and advantageously possesses a **peripheric projection** along its **lower** area onto which the closing cap is coupled and duly retained in the closed position...

...smooth sliding action. Upon mounting the cap in the closed position of the container, this annular projection, on contacting the peripheric nerve or projection on the body of the container, meets a light resistance ...end, has a peripheric groove or channel into which smoothly fits a coinciding nerve or projection inside the closure cap, said container channelling and the cap 's inner nerve forming the smooth container /closing cap attachment system.

The invention also foresees the formation of a circular channel or groove along the inner cap wall, adjacent its open end, which coincides with a corresponding projection that lodges inside said cap channel and provides a means of attachment between both bodies, namely the container and the closing cap.

In order to facilitate as far as possible the understanding of the invention, reference is...

...vertical plane section.

The complementary figure, inside a circle, shows an enlarged detail of the container body and closing cap attachment system, revealing that both the container and the cap present respective annular projections which couple onto one another and hold both elements together when closed.

Figure 2 is...

...showing an enlarged detail of the attachment device in which the channel lodging the attaching projection is formed in the closing cap.

Figure 3 shows an elevation view of a lipstick container fitted with a closing cap shown in a vertical plane section. This figure depicts an arrangement of the closing cap attachment over the container body, the lower zone of which has a peripheric channel into which fits the closing cap nerve or projection, which is thus retained over the container body. This attachment detail of the two bodies...

...body.

Number 4 identifies the cap for holding the product bar 5; number 6, the container closing cap.

Inner tubular body 3 has an extended lower end with a grooved zone 7, advantageously...

...cap, with its open end 8 and closed opposite end 9. Number 10 identifies the annular projection or nerve projecting from the inner wall of the cap; number 11 is the peripheric nerve projecting along the container's inner part. Number 12 identifies the gap between the container body and the walls of cap 6. Number 13 identifies the attachment channel in cap 6; number 14 is the coinciding nerve or projection which, in this case, is formed in the container body.

PREFERRED EMBODIMENT OF THE INVENTION...

...zone 7, the tubular body 2 shows an increased thickness or nerve 11 which extends, uninterruptedly or otherwise, along the periphery of body 2, said nerve 11 acting as a retainer for the cap 6 when the latter is fitted and surrounds the upper part of container 1.

is fitted and surrounds the upper part of container 1.

Cap 6, which provides an upper cover for the container 1, is formed by a cylindrical tubular body with a closed upper end 9 and...

...to establish and secure, between the nerves 10 and 11, a perfect retainer for the cap 6 over the container body 1; the second function consists in forming an annular line having minimum contact with the external wall of the container, thus achieving a smooth sliding movement of the cap 6 over the container body 1; the third function consists in reinforcing the lower open edge 8 of cap...

...tearing.

The enlarged complementary detail in figure 2 reveals that the annular nerve 10 in cap 6, when applied over the container 1, forms a small gap 12 between the two bodies in such a manner that the sliding of the cap 6 over the container 1 is implemented by contacting only the fine annular line offered by the continuous or discontinuous nerve 10 in the cap 6. An extremely smooth sliding action of cap...

...slight resilient radial deformation and surpasses said container nerve 11, thereby retaining and stabilizing the **cap** in the **container** 's closed position.

The container body cap is removed manually by sliding the cap nerve 10 over nerve 11 on the container 1, whereby it resiliently deforms and ceases the blocking to allow movement of the cap 6 to open the container .

The invention also foresees the possibility that cap 6, on reaching the end of its...

...remains lodged in the closed position of container 1. This blocking is

established because the cap's projection or annular nerve 10, upon pressing on the container body, develops a central perimetric pressure; when said annular projection 10 coincides with the channel 11, said pressure pushes it into the channel and stabilizes...

- ...not the only one allowed, since the attachment can equally be implemented by forming the **projection** or nerve 14 on the body of the container and forming the attachment channel 13...
- ...CLAIMS characteristic in that the external body provided with the helicoidal grooves (3) has an external lower zone fitted with a peripheric projection or nerve (11) with a curvilinear section which extends, uninterruptedly or otherwise, throughout the periphery of said body (3) to act as an attachment means for holding the closing cap (6) in the container 's closed position.
 - 2. Improved mechanical container for bar-shaped products, according to claim 1, characteristic in that the **container** closing **cap** (6) has an increased thickness or nerve (10) along the inner side of its open end **edge** which extends, **uninterruptedly** or otherwise, and substantially reinforces the edge of the **cap**.
 - 3. Improved mechanical container for bar-shaped products, according to claims 1 and 2, characteristic in that the annular...
- ...between said body and said cap, thereby reducing the friction between the body of the **container** (1) and the tubular **cap** (6) to a minimum.
 - 4. Improved mechanical container for bar-shaped products, according to claims...
- ...body of the container (1), becoming retained by said nerve (11) and thus securing the cap over the container in its closed position.
 - 6. Improved mechanical container for bar-shaped products, according to claim...
- ...guide channels adjacent its lower end has a peripheric channel (14) for receiving a coinciding **annular projection** (13) that emerges from the inner wall of the closing **cap** (6).
 - 7. Improved mechanical container for bar-shaped products, according to claim 1, characteristic in that the projection (10) emerging from the inner wall of the closing cap (6) extends, uninterruptedly or otherwise...
- ...the container (1) body presents, near its lower end, an increased diameter which forms a projection of a curvilinear section (11) that extends, uninterruptedly or otherwise, throughout its periphery and onto which projection fits the closure cap, said cap being provided near its open end (8) with an inner channel (13) designed to stabilize...

```
37/3,K/46
               (Item 46 from file: 348)
DIALOG(R) File 348: EUROPEAN PATENTS
(c) 2004 European Patent Office. All rts. reserv.
00656000
Container with improved opening system.
Behalter mit verbessertem Offnungssystem.
Recipient avec systeme d'ouverture perfectionne.
PATENT ASSIGNEE:
  LAFFON DESIGN-KREE PLAST S.p.A, (1803180), Via delle Vigne, 17, I-21040
    Venegono Inferiore (Varese), (IT), (applicant designated states:
    BE; CH; DE; FR; GB; LI; LU; NL)
INVENTOR:
  Blachut, Longin, Riva Paradiso, 32, CH-6901 Lugano, (CH)
LEGAL REPRESENTATIVE:
  Martegani, Franco et al (40714), Via Damiano Chiesa, 56, I-20099 Sesto
    San Giovanni (Milano), (IȚ)
PATENT (CC, No, Kind, Date): EP 630598 A1 941228 (Basic)
APPLICATION (CC, No, Date):
                             EP 94201782 940622;
PRIORITY (CC, No, Date): IT 93MI1362 930624
DESIGNATED STATES: BE; CH; DE; FR; GB; LI; LU; NL
INTERNATIONAL PATENT CLASS: A45D-040/22; A45C-013/10; B65D-043/26;
  E05C-019/06; E05B-017/00
ABSTRACT WORD COUNT: 149
LANGUAGE (Publication, Procedural, Application): English; English; English
FULLTEXT AVAILABILITY:
Available Text Language
                           Update
                                      Word Count
      CLAIMS A (English)
                           EPABF2
                                        244
      SPEC A
                (English)
                           EPABF2
                                       1205
Total word count - document A
                                       1449
```

INTERNATIONAL PATENT CLASS: A45D-040/22 ...

Total word count - document B
Total word count - documents A + B

...SPECIFICATION be closed and then opened utilizing the elasticity of the material, without the application of excessive force by the user.

In addition such arrangements are not always aesthetic, requiring the presence of recesses and/or projections on the base and lid at which to apply the opening force by the fingers...

1449

...23 by means of a corresponding notch 25. In the case, for example, of a container for cosmetics products, the lid 13 can be provided internally with a mirror 26. According to the...

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37/3, K/47
               (Item 47 from file: 348)
DIALOG(R) File 348: EUROPEAN PATENTS
(c) 2004 European Patent Office. All rts. reserv.
00632478
Airtight compact case
Luftdichtes Schminkkastchen
Etui a fard etanche a l'air
PATENT ASSIGNEE:
  Kose Corporation, (1181560), 3-6-2, Nihonbashi, Chuo-ku Tokyo, (JP),
     (Proprietor designated states: all)
  YOSHINO KOGYOSHO Co., Ltd., (1732950), 2-6, Ojima 3-chome, Koto-ku, Tokyo
    136, (JP), (Proprietor designated states: all)
INVENTOR:
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    , (JP)
  Sumise, Masahiro, c/o Kose Corporation, 6-2, Nihonbashi 3-chome, Chuo-ku,
    Tokyo 103, (JP)
  Suzuki, Kazuo, c/o Yoshino Kogyosho Co., Ltd., 2-6, Ojima 3-chome,
    Koto-ku, Tokyo 136, (JP)
LEGAL REPRESENTATIVE:
  Klunker . Schmitt-Nilson . Hirsch (101001), Winzererstrasse 106, 80797
    Munchen, (DE)
PATENT (CC, No, Kind, Date): EP 614629 Al 940914 (Basic) = (US) 53 53 818
                              EP 614629 B1 000329
APPLICATION (CC, No, Date):
                              EP 93121041 931228;
PRIORITY (CC, No, Date): JP 9310812 930312; JP 9359905 931108
DESIGNATED STATES: DE; FR; GB; IT
INTERNATIONAL PATENT CLASS: A45D-040/22
ABSTRACT WORD COUNT: 277
NOTE:
  Figure number on first page: 1
LANGUAGE (Publication, Procedural, Application): English; English; English
FULLTEXT AVAILABILITY:
Available Text Language
                                     Word Count
                           Update
      CLAIMS B
               (English)
                           200013
                                      1002
      CLAIMS B
                 (German)
                           200013
                                       954
      CLAIMS B
                 (French)
                           200013
                                      1123
      SPEC B
                (English)
                           200013
                                       5579
Total word count - document A
Total word count - document B
                                      8658
```

INTERNATIONAL PATENT CLASS: A45D-040/22

Total word count - documents A + B

...SPECIFICATION portion 44 has an annular engaging projection 45 formed on its inner edge. The engaging **projection** 45 is mounted on the engaging step portions 27 formed on the annular **protrusion** 24. Thus, the **ring** 41 is attached to the cover 18 so that the ring 41 is rotatable and...

8658

- ...with the male thread portions 7 of the peripheral wall 6 to tightly fasten the **cover** 18 to the **case** body 1. When the female thread portions 51 meet the unthreaded portions 8 of the...
- ...the flange portion 44 of the ring 41 and to the lower side of the annular protrusion 24 formed on the cover 18. The inner cover 61 is for sealing the open edge of the inner tray...
- ...thread portions 51 of the ring 41 meet the unthreaded portions 8 of the

peripheral wall 6, the opening-side elastic piece 57 protruding from the upper surface of the ...of the ring 41 are engaged with the male thread portions 7 of the peripheral wall 5, the closing-side elastic piece 58 protruding from the upper surface of the ring 41 passes over the stopper...

- ...female thread portions 51 are engaged with the male thread portions 7 on the peripheral wall 6. The closing-side elastic piece 58 of the ring 41 passes over the stopper 31 to generate a click...
- ...the cover 18 to stop the rotation of the ring 41.

At this time, the **protrusion** 42 of the **ring** 41 is rotated to reach the cutoff portion 4 formed on the rear side of each of the **case** body 1 and the **cover** 18 to close the cutoff portion 4.

Engagement between the male thread portions 7 and...

- ...brought into press contact with the open edge of the inner tray 5. Thus, the **cosmetic container** section 14 is airtightly sealed.

 It is assumed that the temperature of the airtight compact...
- ...raised due to an increase of atmospheric temperature. Consequently, the temperature of air within the **cosmetic container** section 14 is increased. This results in an increase of the pressure within the **cosmetic container** section 14. In this event, the inner cover 61 is elastically expanded upwards as illustrated...
- ...dash-and-double dot line in Fig. 1 to thereby increase the volume of the cosmetic container section 14. Thus, the increase of the pressure within the cosmetic container section 14 is suppressed so as to avoid interruption of the sealing condition of the cosmetic container section 14 and to support the sealing force of the inner cover 61 strongly pressed...
- ...tray 5 as described above.

On the other hand, even if the temperature within the **cosmetic** container section 14 is lowered to cause a negative pressure therein, the **cosmetic** container section 14 is sealed by the inner cover 61 pressed by the thread portions. Accordingly, atmospheric air never flows into the **cosmetic** container section 14. In addition, when the **cosmetic** container section 14 has a negative pressure therein, the inner cover 61 is downwardly bent so as to prevent the **cosmetic** container section 14 from further decrease in pressure.

Even if the cosmetic product in the **cosmetic container** section 14 contains an evaporable substance, it is possible to prevent the substance from evaporating...groove formed on the outer peripheral surface of its body and engaged with the engaging **projection** 12 of the **peripheral** wall 6 to thereby fix the tray member 9. On the other hand, in the...

- ...uneven portion 47 is formed on the outer periphery of the ring 41. An annular projection 48 is formed on the upper surface of the flange portion 44 of the ring 41. The inner cover 61 is engaged with an engaging projection 49 formed on the inner peripheral surface of the ring 41. No spring (the spring 35 in the first embodiment) is...
- ...elastically brought into press contact with the body-side annular contact member 21. Accordingly, the **cosmetic container** section 14 is reliably sealed.

In the compact case according to the second embodiment also...

...61 is elastically deformed in response to temperature variation to vary the volume within the **cosmetic container** section 14. Thus, pressure variation within the **cosmetic container** section 14 is suppressed so

as to prevent deterioration of the sealing condition of the cosmetic container section 14.

Third Embodiment Next referring to Fig. 20, a compact case according to a...

 $37/3, \kappa/50$ (Item 50 from file: 348) DIALOG(R) File 348: EUROPEAN PATENTS (c) 2004 European Patent Office. All rts. reserv. 00513530 Holder for cosmetic stick Kosmetikstifthalter Support pour baton de cosmetique PATENT ASSIGNEE: WILCO CONSULTANTS LIMITED, (1734130), 788-790 Finchley Road, London NW11 7UR, (GB), (applicant designated states: DE;ES;FR;GB;IT) INVENTOR: Gruner, Claus, Rudolstadter Strasse 21, 0-6823 Bad Blankenburg, (DE) LEGAL REPRESENTATIVE: Viering, Jentschura & Partner (100645), Postfach 22 14 43, 80504 Munchen, (DE) PATENT (CC, No, Kind, Date): (EP. 554496) A1 930811 (Basic) =(US) 5174673EP 554496 B1 APPLICATION (CC, No, Date): EP 92102097 920207; PRIORITY (CC, No, Date): EP 92102097 920207 DESIGNATED STATES: DE; ES; FR; GB; IT INTERNATIONAL PATENT CLASS: A45D-040/06 TRANSLATED ABSTRACT WORD COUNT: ABSTRACT WORD COUNT: 135 LANGUAGE (Publication, Procedural, Application): German; German FULLTEXT AVAILABILITY: Available Text Language Update Word Count CLAIMS A (German) EPABF1 581

CLAIMS B EPAB96 (English) 750 CLAIMS B (German) EPAB96 582 CLAIMS B (French) EPAB96 774 SPEC A (German) EPABF1 2652 SPEC B (German) EPAB96 2660 Total word count - document A 3233 Total word count - document B 4766 Total word count - documents A + B 7999

Holder for cosmetic stick
INTERNATIONAL PATENT CLASS: A45D-040/06

... ABSTRACT Translated)

In the case of a **holder** for a **cosmetics** stick, in particular a **holder** for a **lipstick**, the slotted sleeve (2), displaceably accommodating the cosmetics stick, of the cosmetics stick mechanism is...

- ...of the plunger (1) supporting the cosmetics stick a spring clip (20) with a locking **projection** (21) which points radially **outwards**. In the initial position of the plunger (1) the said locking **projection** is aligned radially with a locking opening (22) in the circumferential wall (24) of the foot part (3), the said opening being designed for the engagement of the locking **projection** (21), and in the end position of the plunger (1) is held out of engagement...
- ...opening (22), counter to the spring force of the spring clip (20), by a radial **projection** (9) integrally formed on the inner wall of the outer **cap** part (8). However, the locking **projection** (21) engages in a locking manner in the locking opening (22) when the cosmetics stick...

...CLAIMS B1

1. Cosmetic stick holder comprising a piston (1) that is adapted to

support a cosmetic stick, which piston (1...

- ...bottom side of the piston (1) is extending an elastic section (20) including a locking **projection** (21) projecting radially **outwardly** , which, in the initial position of the piston (1), is radially aligned with a locking...
- ...circumferential wall (24) of the foot part (3) formed for the engagement of the locking **projection** (21), and which, in the initial position of the piston (1), is supported by a radial **projection** (9), which is formed at the inner wall of the outer cap member (8), against...
- ...the elastic section (20), which is not in engagement with the locking opening (22).
 - 2. Cosmetic stick holder as claimed in Claim 1,

characterized in that

the foot part (3) includes an axial shoulder (10) formed as seat for the radial **projection** (9), which is axially lockable at the axial shoulder (10) by relatively rotating the outer...

- ...part (3) through the screwing sleeve (5) on the other hand, while removing the locking **projection** (21) from the locking opening (22), that in axial direction between the two elements outer...
- ...22) confined by the axial shoulder (10) is formed above the axial shoulder (10).
 - 3. Cosmetic stick holder as claimed in Claim 2,

characterized in that

the axial shoulder (10) is formed as a snapping depression and the radial **projection** (9) is shaped as a round lug.

Cosmetic stick holder as claimed in Claim 2 or 3,

characterized in that

the foot part (3) comprises a guiding groove (14) for the radial projection (9) formed as a round lug, which guiding groove (14) opens into one end of...

- ...it comes into a position in contact with the axial shoulder (10) and the locking **projection** (21).
 - 5. Cosmetic stick holder as claimed in Claim 4,

characterized in that

at the opposite side of the axial...

- ...by rotation from the position in contact with the axial shoulder (10) and the locking **projection** (21) and that the second guiding groove (15) is formed at the side of the...
- ...sleeve (5) when the piston (1) is displaced back towards the foot part (3).
 - 6. Cosmetic stick holder as claimed in one of Claims 1 to 5,

characterized in that

the locking **projection** (21) is radially immersed from **outside** in the locking opening (22) in the case that the foot part (3) is outside of the outer **cap** member (8).

7. Cosmetic stick holder as claimed in one of Claims 1 to 6,

characterized in that

before the foot...

...skin membrane (23) or diagonal members or the like, which is destroyable by the radial **projection** (9) when the foot part (3) is inserted into the outer cap member (8). ...

37/3,K/52 (Item 52 from file: 348)

DIALOG(R) File 348: EUROPEAN PATENTS

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00435812

Smooth drive cosmetic container .

Kosmetikbehalter mit weichem Antrieb.

Recipient pour cosmetique avec entrainement doux.

PATENT ASSIGNEE:

THE BRIDGEPORT METAL GOODS MFG. CO., (1290430), 365 Cherry Street, Bridgeport, Connecticut 06605, (US), (applicant designated states: BE; DE; ES; FR; GB; IT)

INVENTOR:

Wruck, Keith Robert, 55 Stephen's Terrace, Shelton, CT 06484, (US) LEGAL REPRESENTATIVE:

Perry, Robert Edward et al (41331), GILL JENNINGS & EVERY 53-64 Chancery Lane, London WC2A 1HN, (GB)

PATENT (CC, No, Kind, Date): EP 483418 A1 920506 (Basic) = (US) 5000601

APPLICATION (CC, No, Date): EP 90311816 901029;

PRIORITY (CC, No, Date): EP 90311816 901029

DESIGNATED STATES: BE; DE; ES; FR; GB; IT INTERNATIONAL PATENT CLASS: A45D-040/06

ABSTRACT WORD COUNT: 188

LANGUAGE (Publication, Procedural, Application): English; English; English; FULLTEXT AVAILABILITY:

Available Text Language Update Word Count
CLAIMS A (English) EPABF1 431
SPEC A (English) EPABF1 2323
Total word count - document A 2754
Total word count - document B 0
Total word count - documents A + B 2754

Smooth drive cosmetic container .
INTERNATIONAL PATENT CLASS: A45D-040/06

...ABSTRACT A1

A lipstick container comprising:

(a) an inner body member (18) having a lower portion (30) and an upper...

... SPECIFICATION A1

The present invention relates generally to <code>lipstick</code> containers , and more particularly to <code>lipstick</code> containers having mechanical mechanisms for manipulating their associate lipstick masses longitudinally within the containers between extended and retracted positions.

Lipstick containers having mechanisms for manipulating their associated lipstick masses are well-known in the art. The...

- ...slots; the cup being thereby inhibited from longitudinal movement during transportation and handling of the <code>lipstick container</code>. In its protracted locked position, inadvertent downward movement of the cup is inhibited during both the loading of the <code>lipstick</code> mass into the <code>container</code> during the assembly process and the application of associated lipstick onto a user's lips...
- ...outer sleeve to drive the cup element between the retracted and protracted positions.

Torque for lipstick container is generally measured in inch-ounces with the ideal range of acceptability being two (2) to six (6)

inch-ounces. To achieve this range in the prior art lipstick containers, a variety of methods have been used including manufacturing the cup element to have an...

...and assembling the container.

It is a problem underlying the present invention to provide a lipstick container which utilizes a limited number of parts while still providing an ultrasmooth, operating mechanism.

It is an object of the present invention to provide a lipstick container which overcomes the limitations and failings of the prior art designs.

It is a further object of the present invention to provide a lipstick container which has a uniform torque throughout the length of its stroke to create an ultrasmooth operating mechanism.

It is a still further object of the present invention to provide a lipstick container which is relatively inexpensive to fabricate and assemble.

Summary of the Invention

Accordingly, there is provided a **lipstick container** containing an inner body member having a lower portion and an upper tubular portion. The...accompanying drawings.

Brief Description of the Drawings

Figure 1 is a perspective view of a lipstick container according to the invention herein;

Figure 2 is an enlarged exploded perspective view of the lipstick container of Figure 1 without the protective cover assembly;

Figure 3 is an enlarged side view of the lipstick container without the protective cover assembly in cross section; Figure 4 is a view through 4...

- ...Detailed Description of the Preferred Embodiment
 Referring first to Figure 1, therein is illustrated a lipstick
 container 10 according to the invention herein and generally comprising
 two main assemblies which are a...
- ...12 and a main body assembly 14. As can be appreciated from Figure 1, the lipstick container has a hexagonal configuration. However, it is within the scope of the present invention to...
- ...to the direction of rotation. As shown in Figure 3, the cup member 16 has ribs 50 which project inwardly from side wall 52 and aid in retaining a lipstick mass...
- ...member is of a hexagonal shape, the central ring member has six surfaces 52 with **projections** 54 thereon which interact with a corresponding inner surface 56 of the base member 28...formed of metal, is effectively self-lubricating. The projecting elements are sized to apply a circumferentially continuous and uniform predetermined level of light axial squeezing preload against the outer body member 22...

...CLAIMS A1

- 1. A lipstick container comprising:
 - (a) an inner body member (18) having a lower portion (30) and an upper ...
- ...sleeve, whereby an approximately constant torque is required to enable their relative rotation.
 - 2. A lipstick container in accordance with claim 1, wherein the friction means (54) are deployed with at least...

- ...of opposed land surfaces on inside surfaces thereof, to provide the biased engagement.
 - 3. A lipstick container according to claim 1 or claim 2, wherein the friction means surround at least an axial portion of the sleeve (22).
 - 4. A lipstick container according to any preceding claim, wherein the friction means are disposed in the base member (28) without contacting the wall thereof.
 - 5. A **lipstick** container according to any preceding claim, wherein the tubular portion (34) has at least one longitudinally-extending slot formed therethrough and extending to the upper end thereof.
 - 6. A lipstick container according to any preceding claim, wherein the sleeve (22) includes an internal spiral body member (20).
 - 7. A lipstick container according to any preceding claim, further including a cover removably positioned over the sleeve (22...
- ...being in assembly when the cover is fully seated on the base member.
 - 8. A lipstick container according to any preceding claim, wherein each friction means (62) is plastic.
 - 9. A lipstick container according to any preceding claim, wherein a part of the base member (28) surrounding the...
- ...62) project downwardly and are disposed at the intersections of the planar walls.
 - 10. A lipstick container according to any preceding claim, wherein at least the outer surface of the sleeve (22...

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37/3,K/53
               (Item 53 from file: 348)
DIALOG(R) File 348: EUROPEAN PATENTS
(c) 2004 European Patent Office. All rts. reserv.
00404950
Improvements in the dispensing container for a viscous fluid or solidified
    stick-shaped product, particularly for cosmetics.
Behalter
           211m
                 Spenden flussiger, klebriger oder fester stabformiger
    Produkte, insbesondere kosmetischer Produkte.
Recipient distributeur de produits fluides visqueux ou solidifies en forme
    de baton, en particulier pour cosmetiques.
PATENT ASSIGNEE:
  Cardia, Ennio, (729721), Via Durazzo 18, I-00195 Rome, (IT), (applicant
    designated states: BE;CH;DE;ES;FR;GB;LI;LU;NL)
INVENTOR:
  Cardia, Ennio, Via Durazzo 18, I-00195 Rome, (IT)
LEGAL REPRESENTATIVE:
  Taliercio, Antonio et al (51042), ING. BARZANO' & ZANARDO ROMA S.p.A. Via
    Piemonte, 26, I-00187 Roma, (IT)
                                             900912 (Basic) = (US) 5445 465
PATENT (CC, No, Kind, Date): EP 387213 A2
                              EP 387213 A3
                                             910814
                              EP 387213 B1
                                             950524
APPLICATION (CC, No, Date):
                              EP 90830083 900305;
PRIORITY (CC, No, Date): IT 8947736 890310
DESIGNATED STATES: BE; CH; DE; ES; FR; GB; LI; LU; NL
INTERNATIONAL PATENT CLASS: A45D-040/04
ABSTRACT WORD COUNT: 85
LANGUAGE (Publication, Procedural, Application): English; English; Italian
FULLTEXT AVAILABILITY:
Available Text Language
                           Update
                                     Word Count
      CLAIMS A
               (English)
                           EPABF1
                                      2154
      CLAIMS B
               (English)
                           EPAB95
                                      1349
      CLAIMS B
                 (German)
                           EPAB95
                                      1154
      CLAIMS B
                 (French)
                           EPAB95
                                      1362
      SPEC A
                (English)
                           EPABF1
                                      5457
      SPEC B
                (English)
                           EPAB95
                                      5046
Total word count - document A
                                      7611
```

INTERNATIONAL PATENT CLASS: A45D-040/04

Total word count - document B

Total word count - documents A + B

... ABSTRACT a creme, which container dispenses said product in a dosable way on rotation of the **top** portion (6) of the **container** with respect to the bottom portion (2), some tight seal means (22,23) being provided ...

8911

16522

- ...SPECIFICATION are already well known in the prior art, some representative examples of the same being lipstick containers and stick-shaped deodorant containers which are available on the market, as well as containers...
- ...with one or more guiding grooves in its outer surface, which engage with respective guiding **ribs** on the inner surface of the internal body, so that said rod is constrained to...
- ...the rotation of the driving body drives the rod integrally into rotation.

The presence of ribs is often prejudicial to the outer aspect of

the stick-shaped product, and such **ribs** cannot be employed for containing a fluid material and least of all for preserving volatile...

...driving member and the tight-seal inner body, with no grooves and no respective guiding ribs, as such axial guide ribs are replaced by a perimetrical continuous elastic friction which is capable of preventing the propelling member from rotating with respect to...can be supported.

The wall 11 of the outer body 1 has one or more annular ribs 15 projecting towards the inside and forming in the space between them a number of grooves in which the similar annular ribs 16 of the inner body 6 engage, said ribs projecting towards the outside. This engagement, which in the assembling operation of the container occurs as a snap engagement...tubular wall 24.

The inner surface 8 of the inner body 6 has no guiding $\,$ ribs , and the shift of the holder 21 in the axial sense is obtained through a...

- ...holder, which portion scrapes the inner surface 8, and in addition by means of the ribs 23 projecting towards the outside of the holder which cooperate in the scraping action and in keeping the alignment. Thus ...
- ...out of the inner body 6 is free from the unaesthetic marks of the guiding $\ensuremath{\operatorname{ribs}}$.

A **cover** 14 is in contact with the outer body 1 on the step 13 and on ...

- ...wall of the holder, which is provided with a flared upper edge 22 which presses elastically the inner wall 8 of the inner body 6, and is characterized by a uniform shape with no grooves and no respective ribs and is able to contribute an optimal fluid-tight seal in addition to an efficient...flared towards the inner surface 8 of the inner body 6, in replacement for the annular ribs 23, to ensure a better axial fluid-tight seal and a better elastic friction, which...
- ...top wall of the cover 14 is inserted into the dispensing opening 41, when said **cover** is closed on the **container**, in order to further limit the possibility that the product comes in contact with air...the plate 49 at the base of the threaded rod 48 is provided along a **peripheral** crown, with a **continuous** succession of radial tabs 65 which are comb-like arranged and project towards the bottom...
- ...is in the form of a piston head conformed in a way complementary to the closure wall 70 having annular ribs 23 on its outer wall for friction and fluid-tight seal as shown in Fig.1.

 A further modification...
- ...the threading 17 at the base of the rod. Said vertical rod, provided on its **outer** wall with **annular ribs** 78, adheres by pressure to the inner wall 4 of the outer body 1.

 Though...
- ...SPECIFICATION between the driving member and the tight-seal inner body, without grooves and respective guiding ribs, as such axial guide ribs are replaced by a perimetrical continuous elastic friction means which are capable of preventing the propelling member from rotating with respect...
- ...by forced compression that generates gripping or forced engagement between the relative facing or opposite **ribs** of the **bottom** surface of the outer body or of the rod, or **ribs** which are integral with the rod

itself;

- means for rendering unidirectional the rotational motion can...can be supported.

The wall 11 of the outer body 1 has one or more annular ribs 15 projecting towards the inside and forming in the space between them a number of grooves in which the similar annular ribs 16 of the inner body 6 engage, said ribs projecting towards the outside. This engagement, which in the assembling operation of the container occurs as a snap engagement...

...tubular wall 24.

The inner surface 8 of the inner body 6 has no guiding $\,$ ribs , and the shift of the holder 21 in the axial sense is obtained through a...

- ...holder, which portion scrapes the inner surface 8, and in addition by means of the ribs 23 projecting towards the outside of the holder which cooperate in the scraping action and in keeping the alignment. Thus
- ...out of the inner body 6 is free from the unaesthetic marks of the guiding ${\bf ribs}$.
 - A cover 14 is in contact with the outer body 1 on the step 13 and on ...wall of the holder, which is provided with a flared upper edge 22 which presses elastically the inner wall 8 of the inner body 6, and is characterized by a uniform shape with no grooves and no respective ribs and is able to contribute an optimal fluid-tight seal in addition to an efficient...
- ...flared towards the inner surface 8 of the inner body 6, in replacement for the annular ribs 23, to ensure a better axial fluid-tight seal and a better elastic friction, which...top wall of the cover 14 is inserted into the dispensing opening 41, when said cover is closed on the container, in order to further limit the possibility that the product comes in contact with air...the plate 49 at the base of the threaded rod 48 is provided along a peripheral crown, with a continuous succession of radial tabs 65 which are comb-like arranged and project towards the bottom...is in the form of a piston head conformed in a way complementary to the closure wall 70 having annular ribs 23 on its outer wall for friction and fluid-tight seal as shown in Fig.1. A further modification...
- ...the threading 17 at the base of the rod. Said vertical rod, provided on its **outer** wall with **annular ribs** 78, adheres by pressure to the inner wall 4 of the outer body 1.

 Though...
- ...CLAIMS axial direction so pushing the viscous fluid or the stick-shaped solidified product towards the **top** end.
 - 2. A dispensing container according to claim 1 wherein the means that make integral the corresponding opposite and/or...tubular surface (77) projecting upwards is made sufficiently elastic by means of axial slots, the outer wall being provided with annular ribs (78) that scrape the lower end of the inner wall (4) of the outer body (1).
 - 14. A dispensing container...friction means for the axial guide consist of flaring edges (22, 44) and/or of annular ribs 23, or of annular flanges (30) on the outer wall of the driving member (21, 43, 73), that exert...
- ...the transverse wall of the driving member and projecting towards the

bottom and adhering through **elastic** friction to the bottom **wall** (29) or to a tubular wall (33) that projects toward the top portion which is...

- ...CLAIMS portion of said bottom (2), said driving member (21, 43, 73) bearing on its outer wall said elastic sealing and friction means for preventing ist rotation with respect the inner body (6).
 2...
- ...laterally projecting therefrom above the bottom (2) of the outer body (1), at least one annular rib (50) extending, coaxially to the rod axis from the lower surface of said plate (49) towards two corresponding annular ribs (51) upwardly extending from the bottom (2) to snap therebetween.
 - 5. A dispensing container as claimed in claims 1 and 4...
- ...in claim 5, wherein each of said radial tabs (65 resp. 66) has a lateral **projection** (68 resp. 69) at its end portion to attaining a snap connection therebetween.
 - 7. A...
- ...is provided on the lower end of the threaded rod (48) and terminates with an **annular** rib (76) inserted into a corresponding **annular** groove provided in a tubular downward extension (75) of the wall of the outer body...
- \dots extension (75).
 - 8. A dispensing container according to claims 1 and 4 wherein a tubular rib (77) upwardly projects from said plate (49) to adhere to the lower end portion of the inner wall (4) of the outer body, said rib (77) being provided with axial slots to increase its elasticity and with outer annular projections (78) grapping on the lower end portion of the inner wall (4) of the outer body.
- .9. A dispensing container...
- ...A dispensing container according to claim 4, wherein said plate (49) has an annular peripheral edge (53) engaging at least two ribs (54) inwardly projecting from the lower end of the inner body (6) to attain the axial constraint between the inner and...friction means for the axial guide consist of flaring edges (22, 44) and/or of annular ribs (23), or of annular flanges (30) on the outer wall of the driving member (21, 43, 73), that exert...
- ...extending from said transverse wall of the driving member towards the bottom and adhering through **elastic** friction to the bottom **wall** (29) or to its tubular upwardly projecting end wall (33).

 16. A container according to...

37/3,K/54 (Item 54 from file: 348)

DIALOG(R) File 348: EUROPEAN PATENTS

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00379679

Dispensing container for a viscous fluid or solidified stick-shaped product, particularly for cosmetics.

Abgabebehalter fur dickflussige Erzeugnisse oder feste stiftformige Produkte, insbesondere fur Schminke.

Recipient distributeur pour fluide visqueux ou produit en forme de baton solidifie, en particulier pour cosmetiques.

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APPLICATION (CC, No, Date): EP 89830112 890310;

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INTERNATIONAL PATENT CLASS: A45D-040/04

...ABSTRACT A2

A container for products, particularly cosmetic or pharmaceutic products, in the form of creme or stick, which dispenses the product in ...

...SPECIFICATION of this general type are well known in the prior art, representatives of which are containers for lipsticks and stick shaped deodorants.

The containers of the prior art exteriorly show three pieces, a...

- ...US patent it can be seen, in fact, that cartridge 12 is provided with inner ridges 25 to ensure the extracting movement of piston 14. Furthermore, from a structural point of...
- ...to the present invention.

Furthermore in the cited patent there is no teaching to eliminate ridges 25 and at the same time obtain the extracting movement of the piston and the...

...problems with a container which shows the following advantages.

A first advantage is that the **container** with the **cap** on, externally shows only one piece, the other piece operating as a rotation knob being

- ...further illustrated hereinafter. The wall 10 of body 1 is provided with one or more **annular ridges** 13 projecting inwards, between which seats are formed, in which similar **annular ridges** 14, projecting **outwards**, of the inner body 6 are engaged. This engagement, which upon mounting the container is...
- ...practical factors linked to problems regarding moulding of the pieces.

 The last element of the **container** is the **cap** 12. The **cap** 12 is in contact with the outer body 1 on the shoulder 11 and on...
- ...an important feature, enabling a choice of the colour of the product, particularly in the <code>case</code> of <code>lipsticks</code>.

Within the scope of the general structure of the dispensing container according to the invention...central bore 24. The rod 5 of the outer body 1 has a radially extending ridge 25 near the bottom 2. The same bottom 2 has a circular rib 26 for supporting the bottom wall 23 of the inner body 6. The inner body 6 is mounted into the outer body 1 by inserting the rod 5 into the bore 24 until the ridge 25 snaps above the bore 24, thus locking the inner body. The holder 15 is...

- ...so that a shoulder 35 is formed. The inner body 6 is open at the **bottom** and has an **annular rib** 36 locked on the shoulder 35 when the inner body 6 is inserted into the...
- ...body 6 is closed at the top by a closure wall 38 integral with an annular ridge 39 on the inner body 6. The closure wall 38 has a dispensing bore 40...container is stored with the product and the sealing requirements are of considerable importance.

The cap 12 of the container shown in figure 8 contains an inner capsule element 44 integral therewith in sealing relationship...

- ...configuration as to enable the engagement of the undercut beads on crown 52 with an **annular rib** on the crown 53.

 A further embodiment is shown in figures 11 to 13.

 The...
- ...and the inner body 56 is realized at the lower part by means of an annular projection 57 at the lower end of inner body 56 and a flange 58 integral with rod 60, as shown...
- ...skirt 62 pending on a lower wall 59 integral with the rod 60 and an annular slot in an annulat projection 63 on the bottom 61 of the outer body 55.

In the embodiment of figure 11, in order to...

- ...CLAIMS a relative axial movement of the outer and the inner body comprise at least one **circumferential rib** and seat (13, 14) in sliding and force fit engagement, formed on the outer body...
- ...surface of the inner body.
 - 8. Dispensing container according to claim 7, in which said **ribs** and seats are provided in a wall portion of said outer body having reduced thickness...
- ...body, in which the rod of the outer body is inserted, and a radially extending projection (25) on said rod, so that said bottom wall is axially restrained between said projection on the rod and the bottom of the inner body.
 - 10. Dispensing container according to claim 9, in which said radially extending projection of the rod is a continuous annular ridge

(25).

- 11. Dispensing container according to claim 9, in which said radially extending **projection** on the rod is a transversal wall (52) integral with the rod.
- 12. Dispensing container according to claim 2, in which said restraining means comprise a **rib** (35) provided in the **outer** wall of the inner body and a shoulder (36) in the inner wall of the...
- ...container according to claim 13, in which said radial sealing means comprise one or more circular ribs or flanges (26, 31, 31(min)) coaxial with said post, formed on the bottom of...integral therewith provided with an annular skirt (62) and said bottom wall (61) of the outer body (55) has an annular projection (63) having an annular slot to be force fitted to said annular skirt (62) for an assembly in an...
- ...a peripheral flange (58) on said lower wall (59) integral with the rod and an **annular ridge** (57) at the **lower** end of the inner body (56), and
 - said inner body (56) further comrising a radially extending partition wall (64) integral therewith having elastic tabs (65) concentrically arranged around the rod, which are able to slide on a toothed...

37/3.K/56 (Item 56 from file: 348)

DIALOG(R) File 348: EUROPEAN PATENTS

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00367238

Cosmetic container construction.

Schminkbehalter.

Recipient pour cosmetiques.

PATENT ASSIGNEE:

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PATENT (CC, No, Kind, Date): EP 377268 A2 900711 (Basic) = (US) 4966 479 EP 377268 A3 910828

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Cosmetic container construction. INTERNATIONAL PATENT CLASS: A45D-040/04 ...

...ABSTRACT A2

The invention contemplates a swivel cosmetic container of propel/repel variety wherein metering action is achieved by plural resilient detent engagements (29,30) which are readily sensed as multiple equal subdivisions of each single revolution...

...a single elastomeric seal ring (24) establishes hermetic sealing of container contents as well as detent retention of an applied closure cap (10). ...

... SPECIFICATION A3

COSMETIC CONTAINER CONSTRUCTION

BACKGROUND OF THE INVENTION

The invention relates to cosmetic containers of the propel/repel variety wherein relative rotation or swivel action between externally exposed base...

- ...a swivel container of propel/repel variety wherein metering action is achieved by plural resilient detent engagements which are readily sensed as multiple equal subdivisions of each single revolution of the...
- ... And a single elastomeric seal ring establishes hermetic sealing of container contents as well as detent retention of an applied closure cap .

ser destruct

DETAILED DESCRIPTION

The invention will be described in detail for a preferred embodiment, in conjunction...

- ...inwardly in the down direction, and the upper end of the taper has light resilient peripherally continuous wiping and sealing contact with the inner wall of body shell 12. The base-operating...shoulder 25 afforded by the upper end of cup 17. The external profile of seal ring 24 has an axially central bulge between reduced axial ends, and this bulge is in axial register with a shallow peripheral groove formation 26 in the base-operating part 18. As seen in Fig. 7, the bulge of seal ring 24 has transient interference-fit compliant inward deformability within groove 26, upon closure-cap (10...
- ...23 and the seal ring, and a resiliently retained sealing engagement develops for the seal- ring bulge within a shallow undercut groove 27 in the bore of the closure cap, when the...
- ...the axial extent of possible carrier propulsion. In the form shown, this is achieved by **detent** action which modifies required propulsion torque, at equal fractions of each full revolution of components...
- ...respect to each other. For illustrative purposes, the present container provides four such equally dividing **detent** actions for each such full relative revolution, and axial symmetry of **detent** -reaction force is afforded by providing each **detent** action in duplicate, at diametrically opposed locations.

More specifically, the lower end of body shell...

- ...small axial recess (see Fig. 7), at each of four equally spaced locales. To provide **detent** action, two diametrically opposite local axially upward **projections** 30 are integral formations of the upper annular face of flange 23 of the base...
- ...a frusto-conical cam surface 30 of part 18), an axially preloading force exists when **projections** 29 ride the **annular** surface 27, but this preloading force noticeably reduces to zero or near-zero, upon rotation into the relation of Figs. 2 and 3, wherein **projections** 29 are received in the recesses 28 of one of the diametrically opposite pairs of...
- ...described container will be seen to achieve all stated objects, without requiring added component parts. **Detent** action is realizable at as many discrete increments of rotation as desired in that the...

...CLAIMS A3

- 1. A cosmetic container, comprising a base member having a tubular upper end in partially telescoping axially retained rotatable...
- ...extending shoulder formation confronting the adjacent axial end of said
 tubular sleeve member, axially coacting detent formations on said
 shoulder and said adjacent axial end and providing compliantly
 yieldable detent action at each of a plurality of equal angular
 increments of relative rotation of said members, a circumferentially
 continuous elastomeric seal ring in retained assembly to said
 base member and axially beneath the region of detent action, and a
 closure cap removably engageable over and hermetically sealing
 said outer tubular member and carrier cup when in circumferentially
 continuous interference-fit relation with said seal ring.
 - 2. The container of claim 1, in which...
- ...assembly of said seal ring, said second shoulder formation providing an

- axially limiting stop upon container closure by said cap.
- 3. The container of claim 1, in which the number of angularly spaced locations of detent action is at least two, for each full revolution of said relative rotation.
- 4. The...
- ...extending axially below said shoulder formation, and wherein the second part is a cup in **circumferentially continuous** fixed assembly over and to said tubular lower end, said cup having a skirt which...
- ...1, in which said seal ring in unstressed condition has a cylindrical bore and a **circumferentially continuous** outwardly bulging external profile, and in which said seal ring is retained in axially bridging...
- ...whereby said seal ring may compliantly yield to forced radially inward deformation in approach to cap closure of said container.
 - 8. The **container** of claim 7, in which an undercut radially inward groove formation in said closure cap has axially retaining engagement with the bulging external profile of said seal ring upon **cap** closure of said **container**.
 - 9. A **cosmetic container**, comprising a base member having a tubular upper end in partially telescoping axially retained rotatable...
- ...shoulder formation confronting the adjacent axial end of said tubular sleeve member, and axially coacting detent formations on said shoulder and said adjacent axial end and providing compliantly yieldable detent action at each of a plurality of equal angular increments of relative rotation of said...

37/3, K/57(Item 57 from file: 348) DIALOG(R) File 348: EUROPEAN PATENTS (c) 2004 European Patent Office. All rts. reserv. 00335590 Cosmetic casing capable of protruding cosmetic material. Kosmetischer Behalter, geeignet zum Herausgeben von kosmetischen Erzeugnissen. Etui cosmetique faisant sortir du produit cosmetique. PATENT ASSIGNEE: Yoshino Kogyosho Co., Ltd., (231000), No. 2-6, Ojima 3-chome, Koto-ku, Tokyo 136, (JP), (applicant designated states: CH; DE; FR; GB; IT; LI; NL) INVENTOR: Kakuta, Yoshiyuki, c/o Yoshino Kogyosyo Co.Ltd., 2-6, Oshima 3-chome Koto-ku Tokyo, (JP) Mizushima, Hiroshi, c/o Yoshino Kogyosyo Co. Ltd., 2-6, Oshima 3-chome koto-ku Tokyo, (JP) LEGAL REPRESENTATIVE: Klunker . Schmitt-Nilson . Hirsch (101001), Winzererstrasse 106, D-80797 Munchen, (DE) PATENT (CC, No, Kind, Date): EP 379607 A1 900801 (Basic) - (US) 4973178 EP 379607 B1 940330 APPLICATION (CC, No, Date): EP 89101146 890123; PRIORITY (CC, No, Date): EP 89101146 890123 DESIGNATED STATES: CH; DE; FR; GB; IT; LI; NL INTERNATIONAL PATENT CLASS: A45D-040/06 ABSTRACT WORD COUNT: 268 LANGUAGE (Publication, Procedural, Application): English; English; Available Text Language Update Word Count CLAIMS B (English) EPBBF1 1178 CLAIMS B (German) EPBBF1 1106 CLAIMS B

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INTERNATIONAL PATENT CLASS: A45D-040/06

... SPECIFICATION invention relates to a casing capable of protruding a cosmetic material such as lipstick contained in the casing, according the pre-characterizing part of claim 1.

US- ${f A}$ -3 737 241 discloses a lipstick container including tubular members comprising guiding grooves into which engages a projection such that a rotational movement of one of the tubes makes a lipstick holder advancing axially. The container is closed by means of an iris shutter. The shutter comprises...

...to the above-described structure can be dispensed with.

FR-A-937 723 discloses a lipstick container in which two spherical cap halves are moved into a closing or into an opening position by means of a tubular member which is axially moved within a cylindrical housing and which has an upper end portion contacting a guiding surface within each of the spherical cap halves.

Conventionally, an ordinary casing capable of putting out a cosmetic material such as lipstick contained therein has a structure wherein a stick of rouge is protruded from the body...

- ...kind of protruding operation, e.g., rotation of a member on the casing body. It is convenient to design such an article so that the cap is automatically opened and closed in a linked relationhip with the...
- ...with the pre-characterizing part of claim 1, Japanese Utility Model Laid-Open No. 58-88914 discloses a structure as shown in Figs. 11 and 12.
 - A lid 242 is attached to the upper end of a screw tube 214. The srew tube 214 has an inner helical groove 215 formed in its inner peripheral surface and an engaging projection 238 formed on the inner peripheral surface of its lower portion. A tubular body 201 is fitted in the screw tube...
- ...helical groove 221 formed in the outer peripheral surface of its lower portion. The engaging projection 238 of the screw tube 214 is fitted in the outer helical groove 221. A closed inner tube 209 is fitted in the tubular body 201 while an engaging projection 210 formed on the inner tube 209 is fitted in the inner helical groove 215 of the screw tube 214 through the elongated aperture 202 of the tubular body 201. A tail tube 220 is fitted on...
- ...the outer peripheral surface of the rear end portion of the tubular body 201.

As the tubular body 201 is rotated by an operation of turning the tail tube 220 while supporting the screw tube 214, the screw tube 214 is moved downward by the cooperation of the outer helical groove 221 and the engaging projection 238 and the inner surface of the lid 242 is brought into contact with the upper end of the tubular body 201 whereby the lid 242 is turned and opened, as shown in Fig. 12. At the same time, the inner tube 209 is moved upward by the cooperation of the inner helical groove 215 and the engaging projection 210, thereby causing a lipstick 265 to project from the casing.

This conventional cosmetic material casing is useful because the rotary operation of the tubular body 201 moves both the lipstick 265 and the lid 242 so that the lipstick 265 projects from the casing as the lid 242 is opened.

However, in this type of casing, a hinge 242a which is provided at the top edge of the screw tube 214 and to which the lid 242 is attached must be positioned in such a manner that it protrudes outwardly beyond the top edge of the screw tube 214 in order to ensure that it does not obstruct the movement of the tubular body 201 and the inner tube 209. In addition to this protruberant structure of the hinge 242a, the tail tube 220 also creates a protrusion in relation to the overall shape of the casing. Thus, there is a problem of the appearance or the form of the casing being deteriorated contrary to the requirements for this kinds of cosmetic casing.

In the structure whereby the tail tube 220 is attached to the rear end of the screw tube 214, the inner and outer peripheral surfaces of these members repeatedly slide in contact with each other, and the appearance...

...the srew tube 214.

In addition, since the outer helical groove 221 and the engaging projection 238 which cooperate to retract the screw tube 214 are provided in a lower portion of the tubular body 201 while the inner tube 209 is disposed above the outer helical groove 221, a large cavity formed below the inner tube 209 when the lipstick 365 is retracted, as shown in Fig. 11, resulting in an increase in the overall...

...It is an object of the present invention to provide a casing for containing and protruding a cosmetic material capable of performing, in one action, the operation of opening the lid and protruding the cosmetic material, the casing having an improved, simple overall appearance, the overall size of the casing being reduced when the cosmetic material is retracted.

To this end, the present invention provides a casing having the features of the characterizing part of claim 1.

Receding of the lid relative to the screw tube means that at least one of the screw tube and the lid is moved. According to a first embodiment, an engaging projection provided on the tubular member is fitted in a screw groove formed in the outer surface of the screw tube; and an engaging projection formed on the tubular main body is fitted in an elongated groove formed in the inner surface of the tubular member; the screw tube is capable of sliding together with the tubular main body to an extent corresponding to the length of the elongated groove in the tubular member; and the screw tube advances beyond the opening of the tubular member by rotating so as to open the lid and make the inner tube advance.

In another different embodiment, a longitudinal groove for **sliding** movement is formed in the tubular member, and a slidable plate is fitted in this longitudinal slide groove so that it can slide **in** the axial direction of the tubular member. An engaging **projection** formed on the slidable plate is fitted in an outer helical slit provided on the...

...slidable plate can be moved downward as the screw tube rotates in one direction. The lid for closing the opening of the tubular member is pivotally attached to an upper portion of the slidable plate while being urged by a spring in the direction of closing movement. The lid recedes relative to the screw tube by the downward movement of the slidable plate so that it turns in the direction of closing movement by contacting at its inner surface with an upper end portion of the casing Figs. 1 to 6 show a first embodiment of the present invention;

...whole of a casing which represents the first embodiment;

Fig. 2 is an exploded perspective view of the casing;

Fig. 3 is a development illustrating an inner screw groove and an inner horizontal groove...

...the inner surface of a screw tube;

Fig. 4 is a perspective view of a holder guide tube;

 ${\bf Fig}$. 5 is a cross-sectional view of an initial operation of opening the lid;

Fig. 6 is a cross-sectional view illustrating a state in which the cosmetic material is protruded;

 ${f Figs}$. 7 to 10 show a second embodiment of the present invention; Fig. 7 is a...

... view of the casing;

Fig...

Fig. 10 is a perspective view of a state of the casing in which the lid is open;

Fig. 11 is a cross-sectional view of a **cosmetic** material casing disclosed **in** Japanese Utility Model Laid-Open No. 58-88914; and Fig. 12 is cross-sectional view of **the casing** shown in Fig. 11, illustrating a state in which the lid is open. Figs. 1...

...as a longitudinal slit 18b, the closed inner tube as a holder 20, the

engaging projection as a second projection 21, and the inner helical groove as an inner screw groove 16B.

That is, the longitudinal slit 18b is formed in the holder guide tube 18, the holder 20 is fitted in the holder guide tube 18 so that it can rotate in the longitudinal direction while the second projection provided on the holder 20 is projected to the outside of the holder guide tube...

- ...screw tube 16 is rotatably fitted around the holder guide tube 18, and the second **projection** 21 of the holder 20 is fitted in the internal screw groove 16B formed in...
- ...16 so that the holder 20 can be lifted by an operation of rotating the screw tube 16 in one direction. The guide tube 11 which is fixed to the holder guide tube 18 is...
- ...screw tube 16 so that the screw tube 16 can rotate relative to the guide tube 11. A lid 13 for closing the opening of the guide tube 11 is pivotally mounted while being urged by a spring 14 in a direction such that it closes the...
- ...when the holder 20 is moved toward the opening of the guide tube 11 by the rotation of the screw tube 16, the screw tube 16 advances beyond the top end of the guide tube 11 and the lid 13 is moved in the direction of the lower end of the casing relative to the screw tube 16, the inner surface of the lid 13 contacting the top end of the screw tube 16 in turn and open the lid 13.

This construction will be described below in further detail. This example of the **casing** has an outer rear tube 10B which is fitted on and fixed to the outer...

...outer head tube 10A which is rotatably fitted around the outer peripheral surface of a top portion of the guide tube 11.

The lid 13 urged by the spring 14 in the lid closing direction is attached to the outer head tube 10A in the vicinity of the top opening edge thereof, and the screw tube 16 is fitted in the guide tube 11 so that it can slide on the inner peripheral surface of the guide tube in the axial direction and can rotate in the peripheral direction. The screw tube 16 rotates integrally with...16C is formed in the outer peripheral surface of the base end portion of the screw tube 16 so as to connect to the outer screw groove 16A.

A first projection piece 17 is provided in the inner peripheral surface of the guide tube 11 so as to protrude beyond this surface. The first projection piece 17 is engaged with the outer screw groove 16A. The first projection piece 17 functions to advance the screw tube 16 in response to initial rotation of...

...guide tube 18 is fitted on the inner peripheral surface of the screw tube 16 so that it can rotate in the peripheral direction but cannot move in the axial direction. The longitudinal slit 18b is formed in the holder guide tube 18 so as to extend in the axial direction thereof.

The holder guide tube 18 is capable of rotating integrally with the outer rear tube 10B...

...the axial direction at the same time. The holder 20 that supports a stick of **cosmetic material** 19 is slidably fitted on the inner peripheral surface of the holder guide tube 18. The second **projection** 21 formed on the **outer peripheral** surface of the holder 20 passes through the longitudinal slit 18b of the holder guide...

...10B. As the screw tube 16 thereby advances inside the guide tube 11, the top end of the screw tube 16 is brought into contact with the lid 13 and opens the same against the force of the spring 14.

During this operation, the second **projection** 21 of the holder 20 moves in the inner **horizontal** groove 16D in the **inner surface** of the screw tube 16 to the starting end of the inner screw groove 16B... from the advanced position while being guided along the longitudinal slit 18b by the second **projection** 21 moving in the inner screw groove 16B, thereby protruding the **cosmetic material** 19 out of the holder guide tube 18.

During this operation, the first **projection** piece 17 exits out of the terminal end of the outer **screw** groove 16A and then moves in the outer horizontal groove 16C, thereby allowing the guide...

- ...relative to the screw tube 16.
 - (2) Next, a type of structure in which the lid recedes to open will be described below with reference to Figs. 7 to 10. An...
- ...thereof. A closed inner tube 109 is fitted in the tubular main body 101 so that it can slide therein in the axial direction while an engaging projection 110 formed on the inner tube 109 is projected to the outside of the tubular main body 101 through the elongated aperture 102. A screw tube 114 is rotatably fitted around the tubular main body 101, and the engaging projection of the inner tube 109 is fitted in an inner screw groove 115 so that the inner tube 109 can be lifted as the screw tube 114 rotates in one direction. A tubular member 126 which is fixed to the tubular...
- ...is fitted to a longitudinal slide groove 128 formed in the tubular member 126 so **that** it can move in the axial direction thereof. An engaging **projection** 138 formed on the slidable plate 136 is fitted in an outer helical slit 121 provided on the outside of the screw tube 114, thereby enabling the slidable **plate** 136 to move downward as the screw tube 114 rotates in one direction. A **lid** 142 for **closing** the opening of the tubular member 126 is pivotally attached to an upper portion of...
- ...such that as the slidable plate 136 is moved downward, the inner surface of the lid 142 is brought into contact with the upper end of the casing, thereby turning and opening the lid 142. The lid 142 is urged by a spring 143 in the direction of closing movement.

From the state in which the lid 142 is closed as shown in Fig. 7, the casing is operated to open the lid 142 and protrude the cosmetic material as described below. The screw tube 114 is rotated in one direction while the tubular...

- ...is mounted on the outside thereof is held instead of the tubular member 126). (In the illustrated example, a skirt tube 155 is fixed on the outside of the screw tube 114, and a lower outer tube 161 is fixed on the outside of the skirt tube 161. Therefore the lower outer tube 161 is rotated counterclockwise.) In response to this rotation, the slidable plate 136 is moved downward by a force downwardly applied to its engaging projection 138 fitted in the outer helical slit 121. The inner surface of the lid 142 pivotally attached to the upper...
- ...main body 101, the tubular member 126 and the upper outer tube 148, and the lid 142 is thereafter opened against the urging force of the spring 143.

At the same time, the inner tube 109 having its engaging **projection** 110 fitted **in** the inner screw groove 115 of the screw tube 114 is

lifted by the cooperation...

- ...groove 115 and the elongated aperture 102 of the tubular main body 101 as the **screw** tube 114 rotates in **one** direction, thereby protruding out of the tubular member 126 the cosmetic material formed as lipstick...
- \ldots show an embodiment in which the casing has the type of structure described in (1).

Referring first to Figs. 1 and 2, the head portion 10A and the rear portion 10B of the outer tube assembly 10 have equal outside diameters and have outer surfaces flush with each other. The head and rear portions 10A and 10B are rotatable...

...tube 11 in the axial direction thereof.

An attachment tube 15 is fitted in the **top** opening of the outer head **tube** 10A, and **the** lid 13 is pivotally attached **to the** attachment tube 15 while being urged by a pair of torsion coil springs 14 in a direction such that it closes the **top** opening. First **ends** 14a of the springs 14 **are** embedded in the **lid** 13 while the other ends 14b are connected to each other and are inserted in...

- ...attachment recess 15a formed in the outer peripheral surface of a top portion of the attachment tube 15. The recess 15a is covered with the outer head tube 10A, thereby supporting the pair of springs 14. The coil ends 14b themselves having resiliency...
- ...14c of the torsion coil springs 14 so that the rear end surface of the lid 13 in the closed state 1 is normally flush with the outer surface of the...
- ...so that the coil portions are displaced outwardly.

The screw tube 16 is fitted on the inner peripheral surface of the guide tube 11 so as that it can slide in the axial direction and can rotate in the circumferential direction. A guide groove 16f is formed in the outer peripheral surface of the screw tube 16 from the top to an intermediate portion of this tube, and a guide projection 16g formed on the inner surface of the attachment tube 15. Consequently, the screw tube 16 can rotate integrally with the outer top tube 10A and can slide in the axial direction inside the attachment tube 15, namely, the outer head tube 10A.

The outer helical groove 16A is formed in the outer peripheral surface of the...

...extends downwardly from its top end 16a or starting end on the side of the top end of the screw tube 16 to a terminal end in the base end portion of the screw tube 16. The outer horizontal groove 16C is formed in the outer peripheral surface of the base end portion of the screw tube 16 so that it extends continuously from the terminal end of the outer screw groove 16A in the circumferential direction to an extent generally corresponding to one circle.

The first **projection** piece 17 which is fixed on the guide tube 11 and which inwardly protrudes beyond the inner...

...the guide tube 11 is engaged with the outer helical groove 16A. As the first **projection** piece 17 is rotated integrally **with** the outer rear **tube** 10B, the screw tube 16 advances **through** a linear stroke corresponding **to** the distance between its **top** end 16a and the outer horizontal groove 16C.

The inner helical groove 16B is formed...

...to the inner horizontal groove 16D which is formed in the inner

peripheral surface of the base end portion of the screw tube 16 and which extends in the circumferential direction...

...to one circle.

The holder guide tube 18 is rotatably fitted on the inner periphery of the screw tube 16. The holder guide tube 18 has a guide lug 18a projecting...sliding in the axial direction of the screw tube 16 by the engagement of engaging pawls 18e and 18f. The longitudinal slit 18b is formed in the peripheral wall of the holder guide tube 18. Horizontal slits 18c and 18d are formed at the top and base ends of the longitudinal slit 18b, respectively, as shown in Fig. 4. The sum of the length of horizontal...

...on the outer peripheral surface or the inner peripheral surface thereof.

The holder 20 which retains a stick of cosmetic material 19 is fitted on the inner peripheral surface of the holder guide tube 18 so that it can move in the axial direction. The second projection 21 protrusively formed on the outer peripheral surface of the holder 20 is brought into engagement with the inner helical groove 16B of the screw tube 16 through the longitudinal slit 18b of the holder guide tube 18.

Next, the operation and effect of this embodiment will be described below. $\dot{}$

In an initial state shown in Fig. 1, the first **projection** piece 17 is located at the starting end of the outer helical groove 16A of the screw tube 16 while the second **projection** 21 of **the** holder 20 is in contact with a terminal edge 16e of the inner horizontal groove...

...18d.

As shown in Fig. 15, as the outer rear tube 10B is rotated in an initial stage while the **outer** head tube 10A is held fixedly, the outer rear tube 10B, the guide tube 11, the...

...integrally connected to the outer head tube 10A by the attachment tube 15. The first projection piece 17 is thereby moved downwardly in the outer helical groove 16A of the screw tube 16 from the top end 16a along the sloping surface. Relative to this movement, the screw tube 16 advances toward the top of Fig. 2(a) to a predetermined extent in the guide tube 11 and in the outer head tube 10A.

During this forward movement of the screw tube 16, the top end of the screw tube 16 comes into contact with the ends 14b of the torsion coil springs 14 from...

...The coiled portions 14c of the torsion coil springs 14 thereby escape outward, and the lid 13 is opened by being moved upward against the force of the torsion coil springs 14. At the same time, the holder guide tube 18 and the holder 20 also advance through the same distance by following the screw tube 16.

During this operation, the second **projection** 21 **of** the **holder** 20 moves in the inner horizontal groove 16D formed in the inner surface of the screw tube 16 to the starting end of the inner helical groove 16B, **exits** out of the horizontal **slit** 18d and reaches the base end of the longitudinal slit 18b.

As shown in Fig...

...relative to the screw tube 16. This rotation applies an upward force to the second **projection** 21 of the holder **in** engagement with the inner helical groove 16B, and the second **projection** 21 is thereby lifted while being guided along the longitudinal slit 18b of the holder...

- ...cosmetic material 19 out of the holder guide tube 18.

 During this operation, the first **projection** piece 17 exits out of the terminal end of the outer helical groove 16A and...
- ...the guide tube 11 to rotate relative to the screw tube 16. After the first projection piece 17 has come into contact with a terminal edge 16b of the outer horizontal groove 16C, the second projection 18a of the holder guide tube 18 which has reached the top end of the longitudinal slit 18b enters the horizontal slit 18c.

The operation of retracting the **cosmetic** material 19 is **performed** in accordance with the procedure reverse to the above.

As described above, the overall outside configuration of the cosmetic material casing constituted by the outer head tube 10A, the outer rear tube 10B and the lid 13 in accordance with the present invention is simple and the outside surfaces thereof are formed without any protrusions. Thus, the casing of the present invention is improved in the appearance and form to satisfy requirements for cosmetic casings

The above-described structure enables the protruding operation to be smoothly performed and enables the lid 13 to be automatically opened or closed in a linked relationship with the operation of protruding or retracting the cosmetic material 19 or the lipstick, thus making the casing convenient.

.<. Embodiment 2.>.

In this embodiment, the casing has the type of structure described in (2).

The tubular main body 101 has an upper annular **projection** 103 and a lower annular **projection** 105. An **engagement** recess 104 is formed in the upper annular **projection** 103. A pair of elongated apertures 102 are formed in the cylindrical portion of the **tubular** main body 101. Each elongated aperture 102 has left and right horizontal extensions formed at its upper and **lower portions**.

The inner closed tube 109 is fitted in the tubular main body 101 so that it can slide in the axial direction while engaging **projections** 110 formed on the inner tube 109 project to the outside of the tubular main **body** 101 through the **elongated** apertures 102 so as to inhibit the inner tube 109 from rotating.

The screw tube...

- ...rotatably fitted around the tubular main body 101. The screw tube 114 has an engaging protrusion 16 formed on its outer surface and a pair of inner screw grooves 115 which are formed in its inner surface and in which the engaging projections 110 of the inner tube 109 are fitted. The arrangement is such that as the screw tube 114 is rotated in one direction, the engaging projections 110 of the inner tube 109 are moved upward by the inner screw grooves 115 and the elongated apertures 102 so that the inner tube 109 is lifted. An outer screw tube 120 in...
- ...formed is fitted around a head portion of the screw tube 114, and the engaging protrusion 16 of the screw tube 114 is fitted in a longitudinal slit 122 of the outer screw tube 120, thereby inhibiting the outer screw tube 120 from rotating relative to the screw tube 114.

The tubular member 126 is fitted around the screw tube 114 so that it can rotate relative to the tubular member 126. The tubular member 126 is fixed on the tubular main body 101 by engaging its inner engaging protrusion 130 formed on its inner surface with the engagement recess 104 of the tubular main body 101. The tubular member 126 has an upper

- annular **projection** 127, an outer fitting **protrusion** 131, an end cutout 129 and a screw tube fitting portion 132 formed over its inner surface except for **an upper** portion. The tubular member 126 also has the longitudinal slide groove 128 formed on the...
- ...the tubular member 126 so that they can slide in the axial direction of the tubular member 126. The engaging projection 138 of the slidable plate 136 is inserted into the tubular member 126 through the aperture of the tubular member 126 and is fitted in the outer helical slit 121 of the outer screw tube 120. The arrangement is such that as...
- ...in one direction, the outer helical slit 121 applies a downward force to the engaging **projection** 138 of the slidable plate 136, thereby moving the slidable plate 136 downward.

 The outer...
- ...recess 50 formed in the outer head tube 148 is fitted to the outer fitting **protrusion** 131 of the tubular member 126; and portions of the upper head tube 148 on opposite **sides** of a longitudinal slit 149 formed therein restrain an outer portion of the slidable plate...
- ...is pivotally attached by a shaft 144 to the upper portion of the slidable plate 136. The lid 142 is capable of opening by contacting the upper end of the casing, namely, the upper end of one of the tubular main body 101, the tubular member 126 and the outer...
- ...is urged in the closing direction by the spring 143.

 The skirt tube 155 is **interposed** between the screw tube 114 and the outer head tube 148. The skirt tube 155...
- ...that both the rotation and the longitudinal sliding of the skirt tube relative to the **screw tube** 114 and the **outer** screw **tube** 120 are inhibited. A ring 154 is fitted in an annular recess 156 formed in the skirt tube 155. The skirt **tube** 155 can be rotated relative to the outer head tube 148 with the ring 154...
- ...161 closed at its bottom is non-rotatably fitted around a portion of the skirt tube 155. The lipstick 165 is inserted in the inner tube 109.
 - In this embodiment, the screw tube 114 and the outer screw tube 120 are
- ...outer tube 161 is not always necessary. Any other types of construction are possible so **long** as the screw **tube** 114 can be rotated relative to the tubular member 126.
 - In this embodiment, the inner...
- ...slidable plate 136 is moved downward by the outer helical slit 121 to open the lid 142, and the inner tube 109 is moved upward by the inner screw groove 115, thereby enabling a reduction in the void formed at the bottom of the casing. The arrangement of moving the lid 142 downward with the slidable plate 136 ensures that the tubular main body 101 or any other members do not protrude beyond the top end of the tubular member 126 when the lid 142 is opened and the cosmetic material is protruded, thus improving the appearance of the

37/3,K/67 (Item 67 from file: 348) DIALOG(R) File 348: EUROPEAN PATENTS (c) 2004 European Patent Office. All rts. reserv. 00218378 Container type toilet implement. Behalterartiges Toiletmaterial. Materiel de toilette de type recipient. PATENT ASSIGNEE: Yoshino Kogyosho Co., Ltd., (231000), No. 2-6, Ojima 3-chome, Koto-ku, Tokyo 136, (JP), (applicant designated states: CH; DE; FR; GB; IT; LI; NL) INVENTOR: Saito, Tadao, 41-10, Senju Kawahara-Cho, Adachi-Ku Tokyo, (JP) Iizuka, Shigeo, 2-6, Ojima 3-Chome, Koto-Ku Tokyo, (JP) Suzuki, Kazuo, 2-6-, Ojima 3-Chome, Koto-Ku Tokyo, (JP) LEGAL REPRESENTATIVE: Heath, Derek James et al (31711), BROMHEAD & CO. 19 Buckingham Street, London WC2N 6EF, (GB) PATENT (CC, No, Kind, Date): EP 199597 A2 861029 (Basic) (US) 4776717 EP 199597 А3 EP 199597 B1 930630 APPLICATION (CC, No, Date): EP 86303074 860423; PRIORITY (CC, No, Date): JP 8563571 850426; JP 85182319 851126 DESIGNATED STATES: CH; DE; FR; GB; IT; LI; NL INTERNATIONAL PATENT CLASS: A45D-034/04; A46B-011/02 ABSTRACT WORD COUNT: 154

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INTERNATIONAL PATENT CLASS: A45D-034/04 ...

...SPECIFICATION by operating a pumping mechanism provided in the container.

One conventional toilet implement containing liquid toilet lotion comprises a removable cap integral with a brush tip retaining shaft, the lotion in the container being taken up by a brush tip formed at the end of the brush tip retaining shaft. Thus, when making up a face with the implement, the cap is removed from the container and is held in the hand while the lotion carried by the brush tip is coated on the face.

This form of toilet implement therefore makes it necessary for the brush tip to be inserted into the container several times at every make-up session. Further, when the cap is removed, the container may overturn with the result that lotion in the container flows out of it. Also, since the brush tip is dipped directly in the liquid lotion, it is difficult to prevent liquid lotion from dripping from the tip. It has also been proposed in the prior art to provide a...

...described in detail with reference to the accompanying drawings. Fig. 1 shows a first embodiment of a container type toilet implement according to this invention.

The container type toilet implement of this invention...25 and the cylinder 25 is disposed further at the end of the tip 24 **from** the **core** 25.

A pushbutton 29 for pressing is secured to be projected downwardly from the lower end opening of the **container** body 1. The pushbutton 29 **is** formed with an erected tip retaining shaft 30 at the center, and an air vent...

- ...cover 2 is formed at the peripheral edge in an arcuate sectional shape on the 'elastic peripheral wall 32 so that the wall 32 is contacted with the inner surface of the container...
- ...and the pressurized lotion lifts upward the lower portion of the elastic compression plate by **the** elastic compression plate of **the** valve member to open the exhaust valve. Thus, the lotion is fed through the compression...
- ...the suction valve is thus opened to suck the lotion into the cylinder in the **container** body, and the bottom **cover** is moved upward in response to the opening of the suction valve.

 The rubber cylinder...
- ...with the brush tip, the metallic cylinder and the rubber cylinder is engaged with the top of the piston member 11 engaged with the upper inside end of the outer cylinder 35 coated at...
- ...to this invention.

The toilet implement of this embodiment comprises a valve cylinder having a cylindrical neck member 43 internally engaged with a suction valve 42 ...brush tip retaining shaft 45 mounted with the brush tip 44 in the opening end, and a neck member 43 always energized upward at the lower half portion by a return spring 47 mounted around the engaging projection 46 for a valve on the inner periphery, extending upward in a liquidtight manner and elevationally movable manner...

...secured to the tip retaining shaft 45 to form a storage chamber A, and a cap 53 having an engaging projection 50 for forming an exhaust valve 49 to be bonded upwardly from the engaging projection 46 on the intermediate outer surface, drooped downward from the tip retaining shaft core of the storage chamber A secured...

37/3,K/82 (Item 82 from file: 349)

DIALOG(R) File 349: PCT FULLTEXT

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Image available

TUBE FOR LIPSTICK AND THE LIKE

TUBE POUR ROUGE A LEVRES OU PRODUIT SIMILAIRE

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... A45D-040/26

Fulltext Availability: Detailed Description Claims

Detailed Description

extend the lipstick from the tube, apply the lipstick, retract the lipstick, and reclose the tube with one hand.

The tube described and claimed in this application is suitable for use...

- ...which is removed and replaced with each application of the lipstick. For applying lipstick, the cap is removed from the tube, the base portion twisted or turned to project a tip of the lipstick from the tube for application, after which the lipstick is retracted with a turn of the base, and...
- ...cap is 20 replaced. In ordinary use, two hands are normally required to manipulate the tube and apply the lipstick .

Over the years, there have been attempts to develop improved lipstick tubes in sanitary casings with particular emphasis on the idea of combining the functions of opening and closing the tube and of extending and retracting the lipstick 25 in the tube . A primary objective has been to achieve one hand operation of a lipstick tube freeing the other hand for holding a mirror as the lipstick is applied.

The patent...

...subject reveals several structures directed to efforts to improve the design and operation of lipstick tubes by incorporating a cover mechanism to uncover a lipstick tube in the motion devoted to projecting the lipstick 30 from the tube, and to close the cover with the reverse motion for retracting the lipstick into its case .

Fullmer U. S. Patent No 1,979,828 discloses a lipstick case with a split

movable **cover** that slides down the sides of the **case**. The **cover** divides into halves and is moved downwardly on the exterior of the **case** as the **cover** halves drive an internal lipstick carrier upwardly by means of a spring confined to an...

...apparent need for a firm grip as pressure in applying the lipstick tends push the lipstick back into the case .

Fullmer U.S. Patent No 2,091,312 discloses an automatic lipstick holder including an elongate case with a finger piece slidable along a slot in the side...

...the fingerpiece serves to actuate a pivoted split cover member to open and close the **case** as the **lipstick** emerges and returns to position in the case. This patent discloses one hand operation as an object of the invention.

Richter U. S. Patent No 2,002,716 discloses a **cosmetic holder** having 15 a rectangular box-like outer **casing** with **closure** doors pivoted to opposite sides for opening and closing the **top** end of the **casing**. The doors are actuated by means of limited movement of an inner casing which is...

... the face while applying lipstick.

Kasdan U. S Patent No 2,089,832 discloses a **lipstick** holder designed for one-hand operation. The holder is a rectangular **case** with an open **top** and includes an actuator button that slides along a slot in a side panel of...

...the actuator button slides down its slot and pulls the cover panel down into the casing opening the top for an emerging lipstick.

Concurrently, the actuator button moving along its slot rotates the cylindrical **tube** causing the **lipstick** carrier to advance the lipstick through the **top** opening.

30 Specifically, the rotating tube moves a pin affixed to the carrier upwardly along a cooperating slot in the stationary...

...2
Upward sliding movement of the actuator button closes the cover as it withdraws the lipstick into the casing.

Satz et al U. S. Patent No 2,404,815 discloses a sanitary applicator for \dots

...casing. A thumb knob attaches to the lipstick support through a slot in the outer <code>casing</code>. A split <code>cover</code> defines a pair of pivoting doors carried by the open end of the casing. There <code>holder</code> for <code>lipstick</code> comprising an outer open-end <code>case</code> with a split <code>cover</code> pivoted at the open end of the case. An inner sleeve has limited axial movement...

...discloses a control mechanism for 25 opening and closing containers specifically a lipstick holder. The holder includes an outer tubular casing with an open top covered by

a spherical cap split into two sections to act as an open and shut cover. The **cap** sections are pivoted to the **case** and to each other and are opened and closed by longitudinal reach rods connected to...

...and when open, continued rotation of the knob moves the lipstick axially out of the casing for applying the lipstick. Reverse rotation withdraws the lipstick and closes 3 the cover.

Tursky U. S. Patent No 2,552,697 discloses a **lipstick** holder defined by

a generally rectangular, elongate casing with an open end for extending a lipstick...

...pasty material mounted on a sliding carrier and covered by a split shell within a **casing**. As the covered **lipstick** advances out of the **casing**, the shell splits apart exposing the lipstick for application.

Perrotti U.S. Patent No 5,432,622 discloses a **lipstick** holder with movable **covers** wherein a rotary mechanism turning in one direction projects a lipstick and moves a closure...

...reverse direction retracts the lipstick and moves the closure member to fully closed position.

The lipstick holder housing has an enlarged generally rectangular upper portion to accommodate to closure mechanism. As a result, the lipstick holder has a large 25 housing perimeter surrounding a projecting lipstick, and as the lipstick is...

...with lipstick application. That is, there is objectionable contact of the lip area by the **housing** perimeter while applying **lipstick** .

Perrotti U.S. Patent No 5,171,096 is also directed to a lipstick holder

30 that has a more complex and detailed set of intemal working parts for accomplishing...

...4 perimeter.

French Patent No 940, 758 to Galfice is of interest in disclosing a lipstick tube with a split pivoting cap actuated by a spring member.

The foregoing patents represent an extensive effort over the last 5 seventy years to develop a **lipstick tube** comprising a **covered** sanitary **casing**, reliable and repeatable one hand operation for manipulating a lipstick and opening and closing the...

...packing and using of lipstick. in spite of this effort, the most widely 10 used lipstick tube on the market today continues to be a two piece tube including cap and base wherein the cap is manually removed from the base, the lipstick is extended...

... requiring two hand operation.

SUMMARY OF THE INVENTION

The present invention is directed to a **lipstick** tube for one-hand operation in which a sanitary **case** is opened at its **top** end, a

lipstick extended for use and then retracted, and the **case** closed. The lipstick **tube** is held in one hand with three fingers engaging the tube base, and with the...

- ...and index finger engaging and turning an upper section of the tube to open a **tube cover**, extend the 20 lipstick, apply the lipstick, retract the lipstick, and close the cover. The...
- ...weight of the tube conform substantially to those embodied in standard two piece, two-hand lipstick tubes in 25 widespread commercial use today.

In preferred embodiment, the tube according to the invention...

...lipstick, a split shell closure cap for opening and closing the open top of the **assembled** lipstick **tube**, a 30 rotary drive tube fitted over ...actuating sleeve fitted to the rotary drive tube

for opening and closing the closure $% \left(\mathbf{cap}\right) =\mathbf{cap}$, an upper and lower exterior case members.

All of the parts are fabricated of light weight materials and easily assembled into a smoothly functioning unit, wherein by rotating the upper outer case, the rotary drive **tube** retracts the **cap** actuating sleeve to open the closure as 5 the drive **tube** advances the **lipstick** carrier to axially extend the lipstick for use. The lipstick extends through an opening in...

...case section.

OBJECTS OF THE INVENTION

An object of the invention is to provide a lipstick tube capable of one-hand operation.

Another object of the invention is to provide a lipstick tube for sanitary packaging of a lipstick by means of an outer casing and a split shell cap for opening 15 and closing the casing.

Another object of the invention is to provide a **lipstick tube** with a minimum number of easily assembled smoothly interacting parts.

Another object of the invention is to provide a lipstick tube for one-hand operation having the look and feel of standard lipstick tubes .

Another object of the invention is to provide a lightweight lipstick tube enabling one-hand operation with a light touch.

Other and further objects of the invention...

...drawing in which.

Figure 1 is an exploded view of the component parts of the lipstick tube according to the invention.

Figure 2 is a perspective view of an assembled tube (excluding...

...ure 4 is an enlarged, exploded, fragmentary perspective view illustrating closure cap components of the lipstick tube.

Figure 5 is a schematic elevational view illustrating the position of a set of closure...

- ...carrier, support frame, and fragmentary drive tube.
 Figure 7 is a perspective view of the **assembled** lipstick **tube** ready for application of lipstick.
- Figure 8 is a perspective view of a closed lipstick tube

Figure 9 is an enlarged fragmentary perspective view of the under side of the cap...

... THE PREFERRED EMBODIMENT

Referring to Figure 1 of the drawing, a preferred embodiment of the lipstick tube 10 comprises a lipstick 12 mounted on a carrier 14 which together fit inside a support frame 16, a closure cap 18, a drive tube 20, a closure cap actuating sleeve 22, and upper 24 and lower 26 exterior case sections. When assembled the 30 components lie along a longitudinal axis x-x'of the tube.

The lipstick carrier comprises an elongate open ended tube 14 with a lipstick 12 extending from its upper end, and with tracking lugs 14 a-b projecting 7...

- ...closure cap 18 at the top open end 16g of the frame, a vertically extending rib 16h for limiting movement of the cap actuating sleeve to axial only, an integral retaining...drive tube is pushed onto the frame over the retaining ring during assembly. The lower edge of the vertical rib 16h cooperates with the top edge 20a of the drive tube serving as an upper limit to drive tube movement along the support frame. The rib 16h together with the retaining ring 25 16j confine the drive tube axially of the support frame while accommodating free rotation...
- ...section 26, and together the frame and lower case section constitute stationary components of the **lipstick** tube with other **tube** components movable with 30 respect to them.

The rotary drive tube 20 is an open...

...10) on the interior surface of the cap actuating sleeve so that as the drive **tube** rotates left and right the **cap** actuator sleeve 22 oscillates vertically.

The drive tube 20 (Fig 6) has diametrically opposed helical grooves 20 lo j-k formed along its inner surface 20 L The drive **tube** receives the **lipstick** carrier 14 and support frame 16 subassembly with the carrier tracking lugs 14 a-b...

...tube is cylindrical for receiving in loose fit the lower portion 26 of the exterior <code>case</code> .

The cap actuating sleeve 22 (Figs 9-10) is fitted to the top of the drive tube with a cam follower 22a on the inner surface of the sleeve engaging the drive tube cam groove 20f. Relative rotation of the drive tube and the cap actuating sleeve produces axial movement of the sleeve. A vertically extending recess 22b along the inner surface of the cap actuating sleeve registers with the rib 16h (Figs 1 & 4) along 25 the support frame for limiting cap actuator sleeve movement...

The **cap** actuating sleeve has an upper cuff 22c of reduced diameter, and with the cuff wall...

...complete contact of the peripheral edges) of the shells over the top end of the lipstick tube. As shown in Figures 11-13 the facing surfaces 18 h-j of the peripheral...form 10

a dome of sufficient surface area to completely close the opening in the top end of the upper exterior case in a sanitary manner.

For assembly, the lipstick carrier fits within the support frame with the carrier tracking lugs fitted into the Z-slots in the frame wall. The drive tube 5 subassembled with the cap actuating sleeve snaps onto the exterior of the support frame and is positioned between the retaining ring and the lower edge of the frame vertical rib. The carrier tracking lugs project through the frame Z-slots and register with the helical grooves along the inner surface of the drive tube. The closure cap shells are fitted by their pivot blocks to the recess rings, with the actuating link...

- ...to be regarded as stationary in a description of relative movement and operation of the **lipstick** tube **assembly**. By holding the lower exterior case of the tube of Figure 8 in three fingers...
- ...position for the cam 25 follower in order to accommodate continued rotation of the drive tube to achieve lipstick extension and retraction). It is to be observed that this opening of the shell halves ...
- ...axial movement of the actuating links. Next, continued rotation of the exterior case and drive tube brings the lipstick carrier tracking lugs to position at the base of the frame Z-slots. As drive...
- ...rotation withdraws the carrier and lipstick into the interior of the tube and closes the closure cap.

The overall length of the of the lipstick tube is independent of the 5 functioning of the several operating components, and so tube length...

Claim

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. A $\ensuremath{\mbox{ lipstick}}$ $\ensuremath{\mbox{ tube}}$ comprising a cylindrical open $\ensuremath{\mbox{ top}}$ end support frame

having guide means therein, a closure cap for opening and closing the top end of the support frame, a **lipstick** and carrier **assembled** inside the support frame, the carrier having follower means engaging the frame guide means, an...

- ...the drive tube so that rotation of the upper case with respect to the lower case in one direction opens the closure cap, extends the lipstick through the open ends of the support frame and upper case...
- ...the closure cap.
 - 2 A mechanism for opening and closing a closure cap for a lipstick tube comprising an open ended tubular support frame, a closure cap fitted to the support frame...

- ...respect to the open end of the support frame. 13
 - . A closure cap for a lipstick tube and a mechanism for opening and closing the closure cap comprising an open ended tubular...
- ...to the open end 15 of the support frame.
 - 4 A closure cap for a lipstick tube and a mechanism for opening and closing the closure cap comprising an open ended tubular...

. . . t'o

14

the open end of the support trame.

- 5 A closure cap for a **lipstick tube** and a mechanism for opening and closing the closure cap com ' 0 en ended tubular...end of the support frame.
- 6 A closure cap for an open end of a lipstick tube comprising identical spherical segments each having a peripheral edge lying in a plane, each spherical...
- ...segments meet in a tongue and groove joint when the cap is closed.

 B. A lipstick tube comprising a cylindrical lower casing and an 5 cylindrical upper casing, the casings together comprising...
- ...having a long axis, an opening through the top end of the upper casing, a closure cap for opening and closing the top end of the upper casing, a lipstick mounted within the hollow receptacle aligned with the long axis for reciprocating movement with respect to said axis, the upper casing mounted for rotation with respect to the lower casing, 10 drive means including a cap actuating sleeve and a rotary drive tube, said drive means responsive to rotation of the...
- ...direction for retracting the lipstick along said axis, and closing the closure cap.
- 9 A **lipstick** tube as defined in claim 8 wherein the lower casing is held.
 by three fingers of...
- ...by the thumb and forefinger of said one hand.
 - 10 A drive mechanism for a lipstick tube comprising a lipstick, an open ended cylindrical support frame, a Z-slot in the support frame having a \dots
- ...and carrier against vertical movement by means of the upper horizontal slot.
 - 1 A **lipstick tube** arranged along a longitudinal axis comprising stationary components, driven components and a driving mechanism:
- ...carrier slot follower means, a cam slot in the surface of the drive tube, a cap actuator fitted to the drive tube in operative relation to the cam slot and adapted to move axially with respect to the drive

- tube, the cap actuator being restrained against rotary 20 movement with respect to the longitudinal axis, the cap...
- ...direction retracts the lipstick into the support frame and closes the closure cap.
 - 12 A lipstick tube as defined in claim I 1 in which the support frame 30 has a vertically oriented rib and the cap actuator has a vertically oriented slot, wherein the rib and slot engage to permit axial movement and prevent rotary 17

movement of the cap actuator sleeve.

- 13 A drive mechanism for a lipstick tube in which a lipstick is fitted to a carrier and positioned coaxially within a support frame and the support...
- ...engaged by the carrier, a cam slot in the surface of the drive tube, a cap actuator fitted to the drive tube in operative relation to the cam slot and adapted 10 to move axially with respect to the drive tube, the cap actuator being restrained by the support frame against rotary movement, the cap actuator in operative...
- ...direction retracts the lipstick into the support frame and closes the closure cap.
 - $14 \ \mathrm{A}$ lipstick tube having a longitudinal axis comprising a cylindrical

carrier, a lipstick mounted on the carrier, a...

- ...a 25 cylindrical cap actuating sleeve mounted on the drive tube operatively linked to the **closure cap** for opening and closing the closure **cap**, a cylindrical lower exterior **case** and a cylindrical upper exterior case together defining the outer casing of the lipstick **tube**, the upper **case** having an open **top** end concentric with the open top end of the support frame through which the lipstick extends for application.
 - 15 A lipstick tube having a longitudinal axis comprising a cylindrical

carrier, a lipstick mounted on the carrier...

...axis, a cylindrical cap actuating sleeve mounted on the drive tube operatively linked to the **closure cap** for opening and closing the closure **cap**, a cylindrical lower exterior **case** and a cylindrical upper exterior case together defining the outer **casing** of the lipstick 10 **tube**, the upper **case** having an open **top** end concentric with the open top end of the support frame through which the lipstick...

37/3,K/90 (Item 90 from file: 349)

DIALOG(R) File 349: PCT FULLTEXT

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00138319

ROTATIONAL COSMETIC COMPACT

BOITE A POUDRE COSMETIQUE ROTATIVE

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Detailed Description

... majority of cosmetic compacts currently in use comprise a generally dish-shaped base having a receptacle for the cosmetic preparation housed therein and provided with a hinged lid and appropriate latch means for retain...

...suitable

screen. However, when the cosmetic preparation is of a creamy nature, as is the case with eyebrow liner, rouge and the like, the necessary applicator brush or like means is generally carried in a...

...Goertz U*S. Patent 1,712,496 shows a generally cylindrical container for housing a receptacle for a cosmetic preparation and an applicator therefor.

The container is provided with a hollow cylindrical cover which...

... Patent 2,521,269 and Aversa U.S, Patent 3,397,707 show closely related devices which also require removable covers .

Stevens U.S. Patent 1,519,514 shows a powder dispens IG ing device 'having a cap which fits in sliding engagement over the end of a cylindrical container . The cap and container have slots which can be aligned by rotation of the cap in order to dispense...on an inner cylindrical member having both ends closed. The inner member has an open receptacle for a cosmetic preparation disposed in the wall thereof and also contains a compartment for storaga of a...

- ...member causes the elongated slot in the cover to register with the opening of the **receptacle** for the **cosmetic** preparation on the inner member thus making the cosmetic preparation accessible by the user of...
- ...cosmetic compact shown in FIGURE I with the cap rotated to give access to the **cosmetic** preparation **receptacle** and applicator within the body of the compact. FIGURE 3 is a perspective view of...12 of the compact are assembled by sliding the body 12 into the interior of **cap** 10 until the **annular projection** 30, on the **perimeter** of the end 20 of body 12, snaps into place in annular groove 32 appropriately located on the interior wall of **cap** 10. In order to facilitate **assembly** in this manner end 20 of body 12 is not installed until assembly is completed.

Alternatively one or more apertures can be present in end 20 during the **assembly** of **cap** and body and these apertures are sealed after assembly is complete.

When so assembled the...

...groove or step 52 on the inner end of the body 12 and stop or rib 54 projecting from the inner surface of the wall of cap 10 at the junction with end 14, Annular projection 30 is in sliding engagement with the walls of annular groove 32 and rotational movement...the like can be employed if desired.

When the compact shown in FIGURE 1 is **assembled** with the **cap** 10 and body 12 in the particular configurations shown in that FIGURE the end 18...

Claim

- ... having both ends closed disposed in sliding engagement within said outer cylindrical member; an open receptacle for a - cosmetic preparation disposed in a wall of said inner cylindrical member; said outer cylindrical member being...
- ...inner and outer cylindrical members from a closed position of said compact in which said receptacle is covered by the wall of said outer cylindrical member to an open position of said compact...
- ...cosmetic compact according to Claim 7 wherein said inner cylindrical member is provided with an **annular projection** adapted to snap into an **annular** groove in the inner wall of said outer cylindrical member. -1 0
 - 9 A cosmetic...
- ...each other.

10 A cosmetic -compact according to Claim 9 wherein said stop means comprises rib means on the inner wall adjacent the closed end of said outer hollow cylindrical member which rib means traverses a semi- annular peripheral groove on the inner end of said inner hollow cylindrical member during rotation of said...and

eccentrically disposed in said container and open at one end thereof*
a hollow cylindrical cover for said container;
said cover adapted to be rotated about the common axis of said cover and container;
an elongated slot in said cover adapted to register with said recess in the wall of said cylindrical container upon rotation of said cover; and an aperture in said cover so disposed as to register with the open end of said storage compartment in said container when said slot in said cover is caused to register with said recess in said container.

* A cosmetic compact according to Claim 11 which also comprises cosmetic applicator means disposed within said storage...

comprises means for preventing relative longitudinal movement of said cover with respect to said container.

150 A cosmetic compact according to Claim 14 wherein said means comprises an annular projection on said container disposed within said cover which projection engages an annular groove in the inner wall of said cover.

16a A cosmetic compact according -Co Claim...

...be rotated.

20 A cosmetic compact according to Claim 19 wherein said stop 'means comprises rib means-disposed on the inner wall of said cover which rib means traverses a semi@ annular groove on the inner end of said container during rotation of said cover from a position in which said slot in said cover registers with said recess in said container to a position in which said recess is covered by the wall of said container.